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AND
MOTOR LIFE

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DEVOTED TO THE MOTORING INTERESTS OF THE PACIFIC COAST

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CONTENTS

OCTOBER, 1913

Editorial 2
Seeing Crater Lake from the Motor Car 3
To the Geysers in a Day 7
Nocturnal Touring and a Ride at Sunrise 9
Peninsula Touring 11
Good Roads Department 13
(a) Working Organization of Lincoln Highway and Plan for Raising Funds 13
(b) Road Construction About San Francisco 14
(c) The Fifth Transcontinental Route 14
(d) Concerning the Pacific Coast Highway 14
(e) Shell Roads of Galveston County 15
Early Entries in 500-Mile Race 16
Calendar of Events in Motordom for 1913-1914 17
New Things for the Motorist 18
Changes in the Trade 20
What a Cycle Car is 20
Items of General Interest 21-24
The Blessings of Your Motor Car 22
Poem (Anon) 23

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DEVOTED TO THE MOTORING INTERESTS OF THE PACIFIC COAST

In this issue will be found an entertaining compilation of information for the motorist and those interested in automobile affairs, on touring, on roads throughout the Pacific Coast, and what the country is doing with its good roads problem. The reader may learn of the Lincoln Highway and its progress. Given are many new things for the motorist, with more to follow in succeeding issues.

A trip to Crater Lake and to the famous Geysers is recounted in a manner to interest and appeal to automobile enthusiasts. Also may be read the story of a trip by night and sunrise in the Santa Clara Valley.

It is the set purpose of Motoring Magazine and Motor Life to give to the reader a complete, comprehensive and entertaining series of facts that will interest him---facts on roads, touring and everything related to the automobile and its influence on the coast.

MOTORING MAGAZINE
AND MOTOR LIFE

Seeing Crater Lake From the Motor Car

By A. Liebes

California offers much to the motorist for his pleasure in touring, much that is impossible of duplication elsewhere; but her sister States, Oregon, Washington and Idaho, also hold for him a wealth of natural beauty. Idaho has the Snake River, with its canyon of igneous rock, and the Saw Tooth Mountains; Washington has mountains and vast stretches of virgin forests of Douglas fir, while Oregon comes to the front with one particularly excellent example of Nature's handicraft, which is known as the Crater National Reserve. Herein lies the mysterious and beautiful Crater Lake.

We had read much about Crater Lake, and the stories and descriptions of the place that reached our ears fired the imagination to a point of acuteness that left us practically no alternative but to see it ourselves. For this reason a trip to the Lake was planned and executed.

Sacramento was reached by boat. The trip north through Redding, Shasta Springs to the State line, which was crossed at Ager, is ever a beautiful one, and has been enjoyed by many California motorists for years. The roads in the main are smooth enough to permit of comfortable travel at a good pace; and surely the tourist could wish for a no more inspiring sight than is here offered by Nature. For miles, the snow-steeped cone of Mount Shasta glistens in the warm sunlight, looms gray and sombre in the early morning hours, or melts into the most wonderful old rose shades and shadows as the evening settles down, and cool breezes sweep down the canyons and gulches.

When Nature smokes.

We made Redding our first night's control; Shasta Springs, which was reached by way of Kennett, the second. Thus far had we traveled 244 miles. On the third day out of Sacramento, we crossed the Oregon line, and passed through a broad plateau country, where the roads are rocky, twisting and very poorly surfaced —to Klamath Springs. Arriving here in the evening added 72 miles more to the trip.

From Klamath Hot Springs to Harri-

The pleasing vista of Pelican Bay.

A rocky, ragged rim. Remnants of a collapsed cove.

man Lodge on Pelican Bay, the distance is 69 miles, and these miles were such as to make us remember them always. Leaving Klamath Hot Springs, one shortly comes upon a steady uphill pull for ten miles. This is known as Dorris grade. The road surface is adobe, and is frightfully rough and unpleasant for the occupants of the car. After Dorris Grade comes virgin forests to Keno, where the country opens up and spreads out in rolling hills of scattered and sometimes scant verdure, continuing like this to Klamath Falls. All the way from the Falls to Harriman Lodge is "first speed" work over a grade that the speedometer registered as 25 per cent, and which is very rough and winding.

We were now within striking distance of the lake. Our progress had been ever upward until we were close to 6,000 feet above sea level. A start was made early the fifth day for the rim of the lake, which is 1,000 feet above the surface of the lake itself. In fact, so far down is it, and the descent so tiresome and onerous that few people indeed have the courage and inclination for the task. Attracted by the prospect of good fishing, however, we determined to descend, and did so, although the effort involved can hardly be considered commensurate with the number of fish that one is allowed to catch. The limit set by the government is five; and in less than five minutes each one of us had that many, for here is one body of water where fishing can be really and truly called "good." Also, it is a most inspiring sight to view the surrounding sides of the lake, which tower precipitously upward in ragged battlement of rock of volcanic nature. The coloring is really the most astonishing effect to be seen. Nature alone knows how to blend colors or contrast them, and the attempts of artists for centuries to emulate her feat as a colorist has been, and no doubt always will be, a stimulus if not an incentive to artistic accomplishment.

Engine still running with gallons of water aboard.

Snow was met up with 39 miles from the Ledge on Pelican Bay. But the rim of the lake was drawing closer, so we plowed through it for several miles. Occasionally steep pitches appeared, where we found it necessary to throw the limbs and foliage of trees beneath the wheels to obtain traction. Most of the road from Pelican Bay to Crater Lake was reasonably good—that is to say, it wasn't at all bad, at least so bad as one might expect in that kind of wilderness. The pull on the motor, however, is a steady one, and careful and discreet driving is requisite, since the water in the radiator boils very easily in the high altitude, and most of the way the curves and turns—narrow themselves as to clearance—are flanked by most appalling precipices and denuded declivities. At Camp Arant, we

Snowy peaks and pinnacles above the lake.

were compelled to register before entering the National Park. The roads in the Park are in very passable condition, and the motorist can find nothing to complain of in this respect, all the way to the rim of the lake, where sits the tavern.

We were about the first automobile touring enthusiasts to penetrate the wilderness protecting the lake, and at that time enjoyed the distinction of climbing farther through the snow than any other car. At that, we were unable to drive the car entirely to the tavern, as no road was cut, and the snow, beat upon by the hot sun, was mush like in consistency and in places very deep. The car was left standing in a sheltered place, while we, suit cases and baggage in arms, labored up the hill over the snow to the Tavern on the rim of the lake.

The morning of the sixth day was spent fishing—that is to say, rowing about the limpid surface of the lake, for we fished but very few minutes—and that afternoon at 2:40 we said good-bye to the lake and the lake's hostelry en route to Klamath Falls by way of Fort Klamath. We put up at the White Pelican Hotel, where accommodations are excellent, having covered, since leaving the Crater Lake, a fraction over 60 miles.

Trexalls—a farm house on Eagle Lake—proved our destination the night of the seventh day. We traveled 100 miles by way of Merrill, Malin, Lookout, Adin and Grasshopper. To Merril the roads are good, but at Malin we missed the road that leads over a bridge, and were compelled to ford the stream. The water was deeper than we hoped, and as a result, in midstream the engine stopped running. Water filled the pan and the muffler, even pouring into the body of the car. However, the carbureter was set high enough to clear, and therefore was able to fulfill its function properly. The starter turned over the motor. The muffler cleared out somewhat and the motor started humming. We were able to pull out on our own power, although a larger car, which followed us, was not quite so lucky. Once on shore, we drained two gallons and a half of water out of the crank case. Putting in a fresh supply of oil, the journey was resumed.

Then came 68 miles of absolute desolation. The country assumed the shape of a plateau, sans trees, sans foliage, sans life. There was to be seen not one living object. No farm houses, no human beings, no animals, not even a jack rabbit greeted us. The road was in frightful condition. For miles the center of the road was so high as to make travel over it very uncertain. In many places it became necessary to straddle rocks. On one of these we noticed a deep scar, and a smear of oil. Then, for several miles, was visible a stream of oil. Some unfortunate tourist had knocked off the drain

Seventy miles of God-forsaken waste.

valve of the crank case.

At Adin we encountered the grade known as Adin Hill. This is reputedly a hard pull for the motor car. According to the speedometer, the grade pitched at 35 per cent. We passed five cars that were unable to make the climb; they at length gave up, and contented themselves with a twenty-five mile detour. We came upon Eagle Lake at sunset. This body of water is 25 miles long, and in the soft glow of evening, presented a very attractive and inviting front.

We headed for Lake Tahoe and arrived there two days later, stopping at McKinney's. The first night out from Eagle Lake was spent at Campbell's Hot Springs, some 131 miles from the lake. We passed through Susanville, Crescent Mills, Indian Falls, Quincy, Mohawk. Near Quincy we ran into a cloud burst that certainly made good its name. We were up about 6,400 feet, and therefore it seemed to hit us harder. The thunder rumbled unpleasantly close, to say nothing of most alarming flashes of lightning, which seemed to strike all about us. These flashes were actually blinding.

Turning back from McKinney's, we passed through Truckee, thence to Verdi, Reno, Carson City, Nevada. We found the roads slippery—dangerously so—and rain fell continually. Out of Carson City

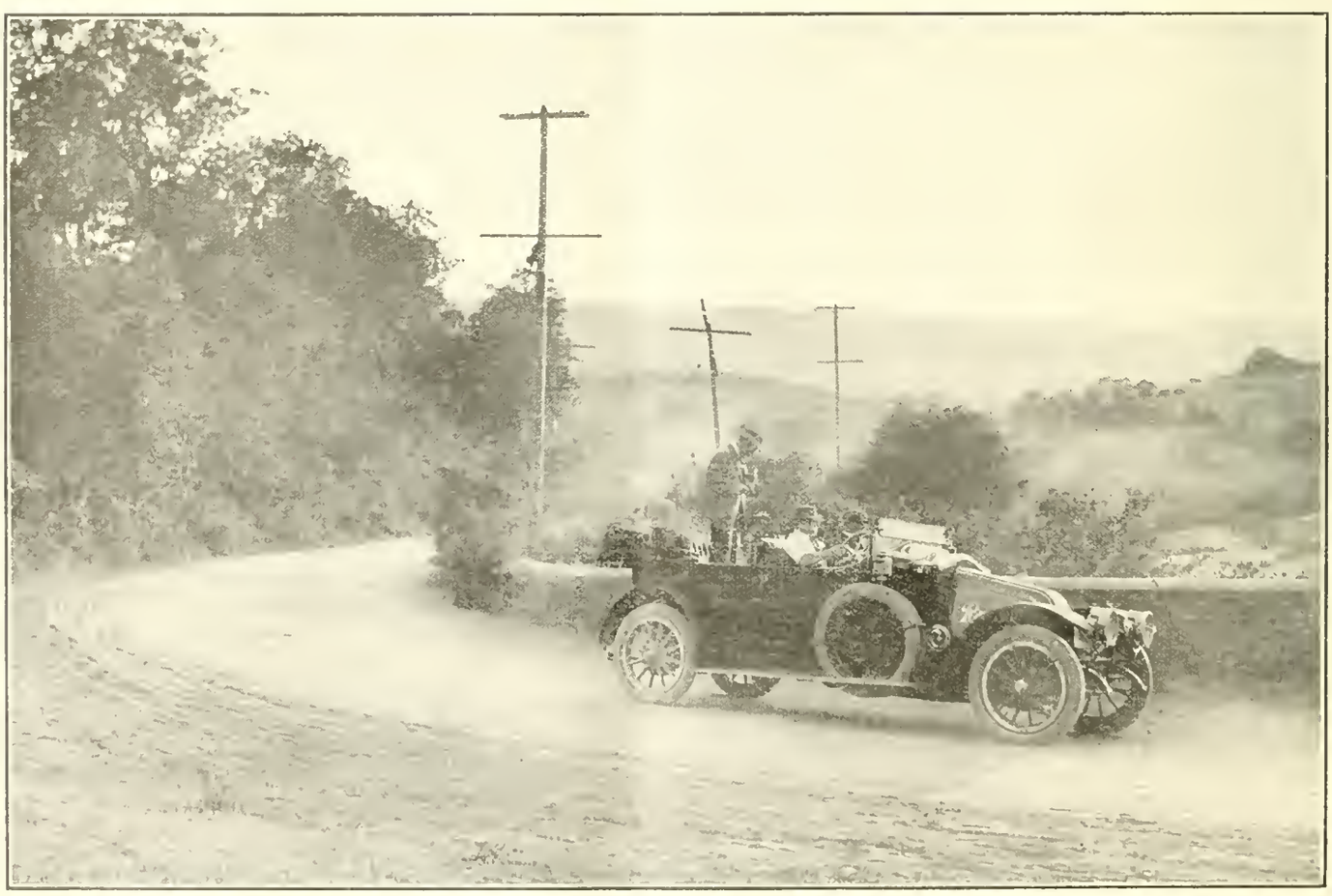
A glimpse of Nature's perfect mirror.

we undertook the long climb up the Kingsbury Canyon, which is 16 miles long, a 23 per cent grade, and 7,400 feet above sea level. A strenuous climb, indeed. The return to Sacramento was uneventful, though very muddy and wet. Leaving Sacramento, we toured to Skaggs Springs, and from there to the Sausalito ferry. This last was a run of 84 miles, which was covered in three and one-half hours. This was really the first time on the trip that an effort was made at speed.

Summing up the trip, we were away 15 days; we traveled in that time 1,294.6 miles. The little car used for that distance 123 gallons of gasoline and 15 quarts of oil. We had five punctures, but no blowouts; the tires served us very finely indeed, as did the car.

Four people made up the party, including 100 pounds of baggage. Outside of extra tires, gas and oil, we carried nothing beside the water bag, which is indispensable. We crossed four mountain ranges between 6,300 and 6,500 feet high, with two of these over 7,400 feet. According to the gradometer, the grades climbed ranged from 20 to 35 per cent.

To properly praise the pleasures of this trip is impossible, but in concluding, let me suggest that the motor car enthusiast take this trip and observe its wonders, delights, opportunities for free thought, for himself. It would be hard indeed to single out and undertake a more complete one.



Snapping good road scenes on the peninsula.

S. G. V. car in scenically beautiful Sonoma County, near Geysers.

To the Geysers in a Day

By W. F. Hamilton

The motor car is the thing. And generally the moment one comes into possession of a motor car, the thought runs to touring. Having conceived the idea—in California if not elsewhere—visualization is easy. Thousands of attractive tours, both long and short, at once present themselves in inviting array. Choosing becomes difficult, if not a positive problem. However, each one offers so many distinctive scenic thrills, natural wonders and myriad out-of-door sensations that to make a wrong selection is but remotely possible. The condition of the road is the serious question. If good, "go to it," and the chances are that you will return home—tired, perhaps—but otherwise in the most pleasant frame of mind.

We chose as our destination the Geysers in Sonoma County. Properly, the trip should consume the greater portion of two days, for when we arrived in Sausalito, rounding out the trip, the speedometer showed 206 miles traveled; and here let it be said that 206 miles over winding mountain roads, where caution breeds tedium, is not so easy on nerves as the tyro might suppose. Then, again, the country one passes through on this most delightful of trips is so worth while seeing thoroughly that to hurry on against time seems a wanton affront to Dame Nature, the metaphorical lady having done so much to make herself attractive to the senses. Strange to say, Nature's appeal is ultra physical; it is metaphysical, for the chords of the spirit are deftly struck. One is intensely aware of something other than what is reflected on the retina of the eye or sensed through ears and olfactories. The Indians caught a glimpse of this underlying and sustaining something when they called a certain lake "the smile of the Great Spirit." White calls it "Silence," and devotes pages to the description, but it is enough to know that it is there, and that it adds much to the pleasure of touring.

Yet a day was all we permitted ourselves for the trip, which included taking pictures and the complete, though cursory, exploration of that natural wonder—the Geysers. And we filled it full. At five-thirty a. m., preparations for the trip were under way, and three o'clock had struck—nearly twenty-two hours later—when "short sheets were making the bed seem longer."

The 6:45 boat carried us to Sausalito, along with many other machines, motorcyclists, "tooters," etc., on their early way for a day's outing. At seven-thirty the speedometer was set at zero, and a start for the Geysers made. The road that winds along the bay leading out of Sausalito is not in good condition. It should be cared for at once, as much travel by automobile must go this way when touring Marin County.

Most motorists have taken the trip to Healdsburg by way of Petaluma and Santa Rosa, so there is but little to be described, other than the condition of the road. In the main, roads between those named towns are reasonably good, and a steady pace of thirty miles an hour may be maintained with comfort to the passengers in the car. Near Corte Madera

S. G. V. car and tourists at the Geysers.

the highway is under construction for several miles, which wouldn't be so bad if the contractors were but thoughtful enough to provide "turn out" signs, as they are required to do by the Highway Commission. The lack of these caused us some delay, at night particularly, as we were returning, for we wandered far into some Stygian wilderness of redwood trees and live oak, and experienced difficulty in finding the main road again. This delay, and extra mileage, cost us more than at first appeared, inasmuch as we arrived at the ferry just ten minutes too late to catch the last boat for San Francisco. Ours was then not altogether a cheery outlook. It is quite certain that whatever Sausalito's charm, it is not her fine hotels and caravansaries, nor her restaurants. Suasion, neither moral, ethical nor monetary, was of avail with the ferry boat officials, who politely refused to run a boat unless at least four machines of equal misfortune were at hand. Alas, we were but one: no others came, and we turned to a night watchman who, with mellow unction, suggested several most unprepossessing alternatives. But he was a friend indeed; and after a few glances at the various rooming houses nearby, which did not appeal, he led us to a thirty-foot launch, in which, a few minutes later, we snorted out upon the rolling bosom of the bay. This was about 2 a. m. We considered this trip a fitting finale for the day. The automobile was left in care of the watchman overnight on the Sausalito side, and was called for the next morning, or rather that same morning—later.

Petaluma was passed through at 9:20 a. m., and Santa Rosa at 10 o'clock. Going over the rolling hills of Sonoma County was very good, and in the cool, clear air of the morning, very refreshing and invigorating. We reached Healdsburg at 11 o'clock. The road between Santa Rosa and Windsor, on the way to Healdsburg, is being improved by the Highway Commission for a distance of about ten miles. "Turn out" signs are here in evidence, and with one or two exceptions these byroads are in good condition, save for dust. In one place, however, it is necessary to follow an improvised road that runs alongside of the main highway. This is unpleasant going, but will not be in use but a short time, as the main road at this point is nearly completed.

We drove into Healdsburg, and to the Plaza, or main square, turning to the right, then left, to the highway that runs out of town for three miles to what is known as the "Forks Road House." Taking the right hand road, which is plainly marked as the one leading to the Geysers, we passed through several gates, which, owing to defective opening and closing mechanism, we were compelled to operate by dismounting from the car. These, for the sake of the many tourists that pass this way each week, should be put in working condition. A very simple matter indeed, and calling for no great expense.

Twenty-two miles in second speed came next, over roads that are twisted and curved most tortuously, and which are so narrow that the element of danger is very great. It will be at once observed that a car of long wheel base will meet with much difficulty here, as the curves and turns are of the hairpin variety, with steep declivities falling away from the outer edge of the road. The man unused to driving in the mountains must be very careful. Speed is to be deplored, while the constant sounding of the horn is absolutely necessary. The scenery, though, is magnificent.

Two separate ridges were climbed ere the descent to the Geysers began. The altitude at this point is very close to 4,000 feet, and as is to be supposed, an excellent sweep of country—valleys, mountain ridges and timber—may be studied from here. At the Geysers we were advised that the altitude there was 3,300 feet.

Our speedometer registered 99.2 miles when we pulled up in front of the Geysers Hotel, which will be found to snuggle in quaint outline among the wooded steeps of the canyon. Although the season was over October 1st, yet we were given an excellent, if impromptu, dinner, but a very few minutes after our arrival. By the time this narration appears, however, it is quite likely that the hotel will have closed for the winter; and unless the tourist fancies a typical "batch" dinner

with the care-takers, he had best provide himself with adequate luncheon.

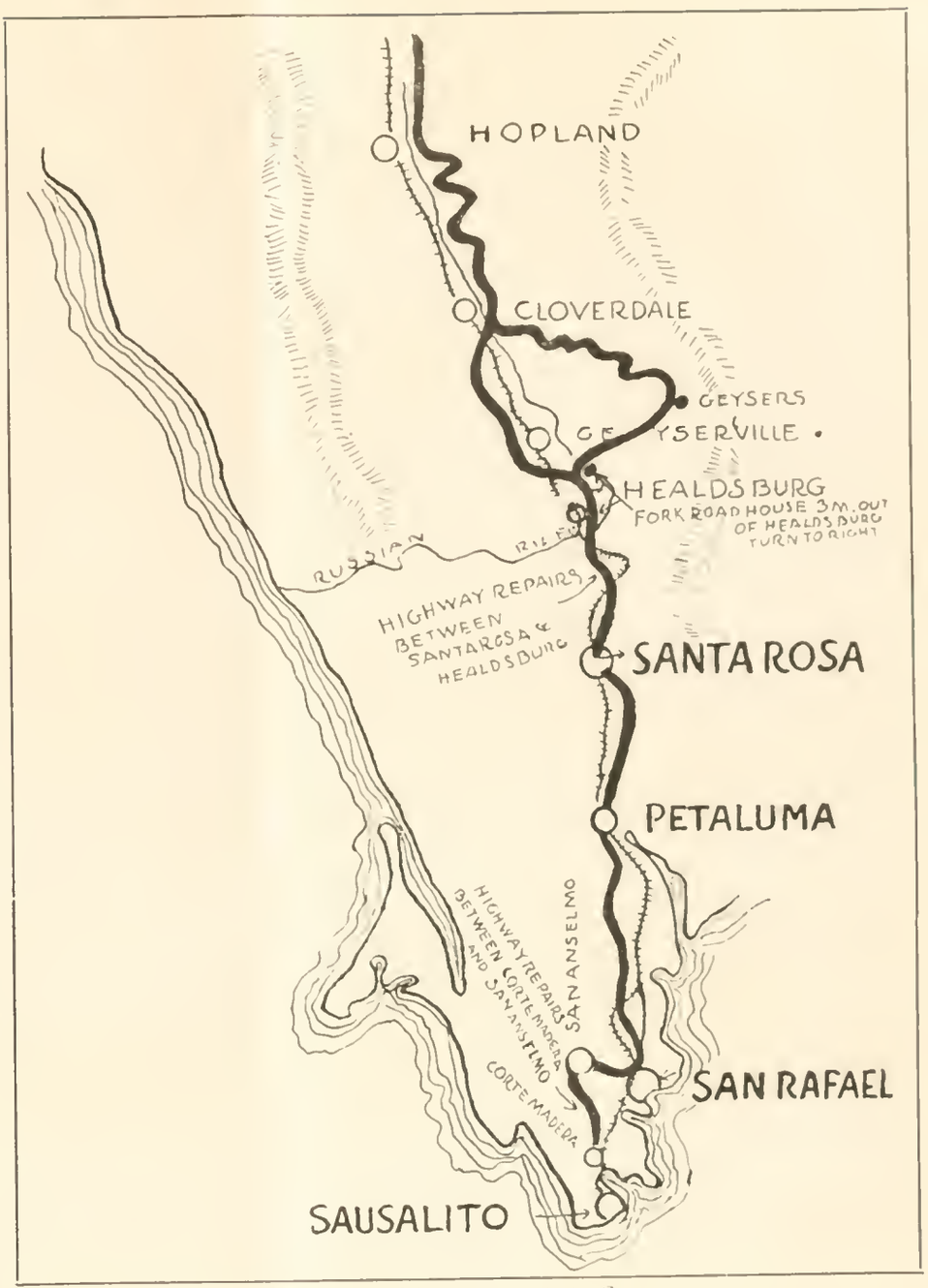
We allowed ourselves just time enough to make the round trip of the Geysers with which the canyon abounds. The trip is a frightfully hot one, and the climb a bit onerous, despite the stout alpine staffs which the loquacious guide makes it his duty to provide. Yet, withal, the sight of a hill boiling away in steam and sulphur is sufficiently out of the ordinary to repay one for the time and effort spent seeing it.

At exactly 3:45 we left the Geysers, heading for Cloverdale. The route this way is easily the most beautiful, and is all down grade. For 15 miles we wound and twisted through picturesque mountains, primeval forests and rocky, precipitous canyons, ever downward to the creek bottom where Cloverdale has its limited being. But the going is most painfully slow and tedious. Danger lurks at every turn or curve, and the bridges that span yawning chasms are but frail things at best. One in particular lurched and gave to the weight of the car in the most alarming fashion. Owing to the curving approach, the car must necessarily strike it with a side swing, to which condition one may attribute its shaky state. But the automobile stage crosses it each day successfully, so we could not bring ourselves to worry much. We were two tiresome hours making the descent. Gasoline was taken on at Cloverdale, whereupon we sped southward for Healdsburg.

Nocturnal touring is ever pleasant, but the writer would like to have some one explain to him whence come those icy blasts of air that penetrate the warmest habiliment, and which are to be met with in almost every depression in that part of the country. The sea breeze is a heat-soaked trade wind compared with them.

Just outside of Healdsburg we slowed up for the notorious "Death Curve," and found an overturned car in the ditch. A crowd was gathered, and the conversation was hushed and the general atmosphere solemn. A pool of blood told a grim story. One man killed and another injured was the result of attempting to take that right angle turn at high speed. Drivers of automobiles are a long time learning caution. Accounts of so many accidents cause us to wonder, however, if they are actually learning.

Barring the incident of losing the road, due to careless contractors, as already chronicled, nothing of an exciting nature happened between here and the Sausalito ferry, which was reached at 12:10 a. m. Once home in San Francisco, we were immensely proud of the trip and the miles covered, but we feel constrained to advise that the trip, for the best to be had from it, be made in at least two days.



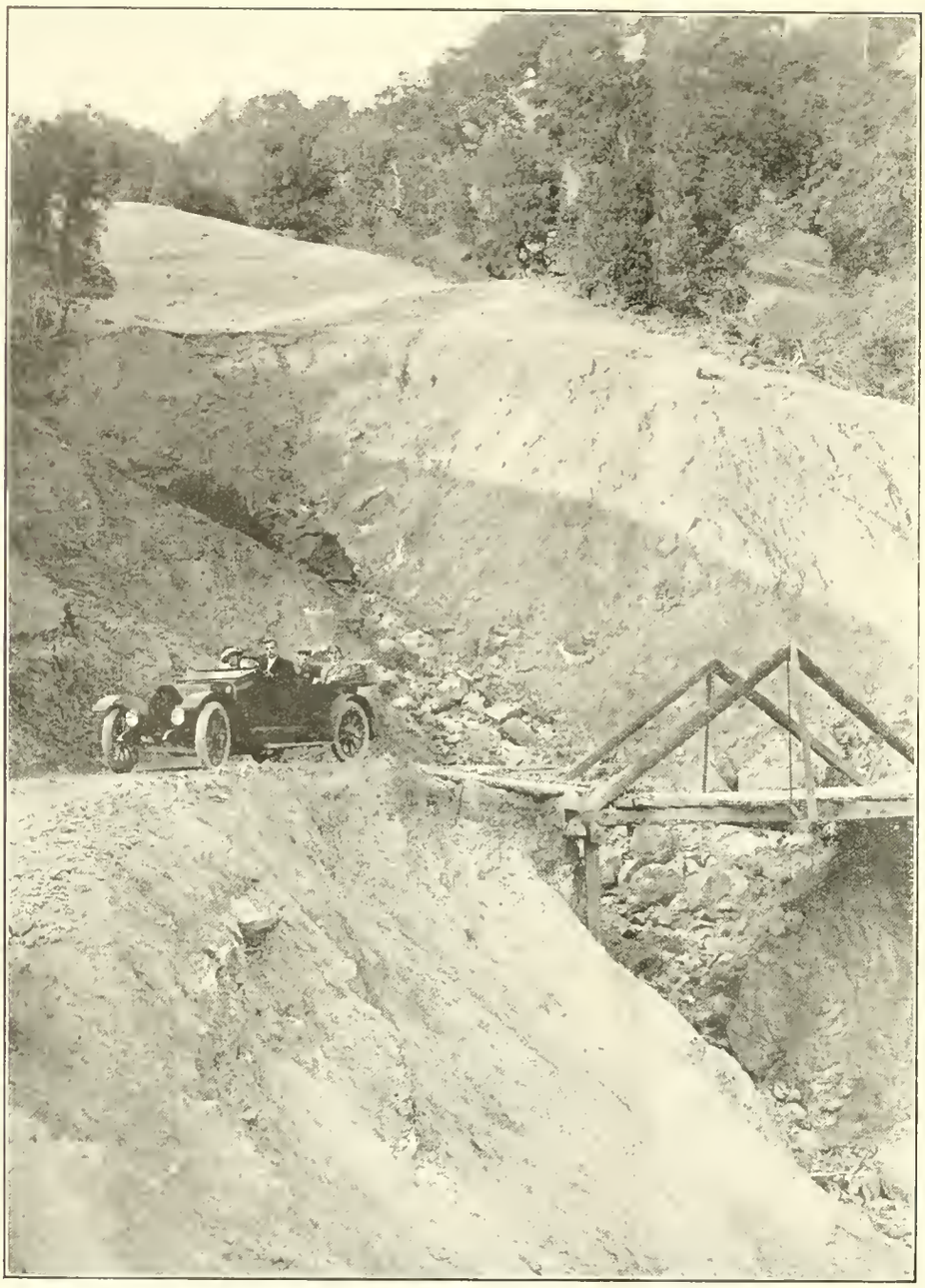
Map of road improvements to Geysers.

The party included A. Weiland, who designed the first S. G. V. car, and who is visiting the Coast for the first time; Mrs. A. Weiland; W. H. Carey, manager of the De Luxe Oil Company of San Francisco, and the writer. The car was equipped with the electric gear shift, and was really the introduction of the electric gear shift to mountain work. The result was a revelation. Being able to shift gears without removing the hand from the steering wheel is an important feature in mountain work, for the danger on curves and turns is thereby greatly reduced.

All things said, there remains nothing more delightful than a tour through the mountains. The gentle purr of the motor, comfortable and swift progress whither so ever one wills, the splendor of the passing view, are privileges not to be eschewed. We owe much to the motor car commercially, but in our heart of hearts alone, and there only, can we feel what it means to us as a means of pleasure. More cars and better roads, and we may enter the future holding hands with Happiness and Prosperity.

Nocturnal Touring and a Ride at Sunrise

It wasn't a tour exactly, being wholly unpremeditated; and we paid little or no attention to the passing of time, direction of travel, or the names of towns through which we passed. The idea was simply to ride in the country at night, and during sunrise in the morning. No more interesting time could have been selected.



A shaky bridge near Cloverdale on the road to Geysers in an S. G. V.

Night has her charm and mystery, sunrise its color and startling splendor.

Clocks in San Francisco were striking 2 a. m. when we started out through the slumbering Mission. There was really but one general direction to take, and we took it—down the peninsula. The cool air held the sea tang which refreshed the lungs, and smelled sweet and fresh with autumnal fragrance. A full moon beamed encouragement; the motor whirred its steady song; and the roadbed through the Mission was smooth and invited speed. Somewhere in the hills on the left side, roosters were crowing. To the right, across a low gap in the opaque ridge, lay a vast expanse of ocean, shimmering in the moon's reflection.

Swiftly we sped along the edges of the garden spot where the dead rest—the cemeteries; and on beyond, between rows of windmills turning lazily in the sea wind, to the railroad crossing. Here we stopped, perceiving before us a wrecked machine. The train, perhaps; or struck by the electric car! But we were quite wrong, it later developed, in thus surmising. The motor car—a new one—was collapsed against a telegraph pole, its front axle snapped, radiator and wind shield ruined, its front wheels driven clear into the front seat. It was encouraging to recognize no signs of human injury or death, though we marveled at this phenomena, considering the condition of the car.

We drove on. We came to that silvery stretch of perfect road, the El Camino Real, giving the engine a trifle more throttle just to feel the delightful rolling sensation accompanying the gentle pressure.

Five miles, and the headlight beat upon two figures walking in the shadow of the eucalypts. They signaled, but we ran past them, until there came to us the thought that here, possibly, were the occupants of the wrecked car. We stopped and waited their approach. So it proved.

They—a man and his wife—were deeply grateful for the lift we gave them to San Mateo, for, having been refused a ride in two cars, they had given up hope, believing themselves abandoned to a lonely, tiresome walk home to San Mateo. Singular, and very unfortunate; but two weeks before they were the unlucky participants in an auto wreck, and the car, that very day, had just been driven from the garage in San Francisco. In crossing the tracks, the man had lost control of the machine for one instant—a disastrous instant and quite sufficient to wreck the car. But they philosophically held themselves very lucky to escape.

We swung into San Mateo, and out again to avoid the stretch of highway under improvement. Redwood City soon blazed and glistened in the harsh glare of our penetrating headlights. So, in the friendly moonlight, with the sea tang in our nostrils, we rolled swiftly through and on, soon putting far into the gloom behind us Redwood City and the road to Palo Alto.

But not so fast, this link of the nocturnal journey! A long stretch of highway under construction was met, where the contractor inadvertently neglected to label turnouts. We brought up in a ravine, where much timber grew and where a purling brook babbled musically seaward. The only alternative offering—that of turning around—we hastened to take advantage of. Back a quarter of a mile, by the railroad station, we detoured to the left, through wide-reaching orchards and live oaks, ultimately to Palo Alto.

This pretty village lay supinely, serenely asleep. We closed the muffler so as not to disturb its unconscious somnolence. Once beyond it, however, there was more highway improvement, and attendant side rides none too comfortable or soothing. We did not lose our way, however.

Then came a wonderful boulevard for many miles, almost to Santa Clara. Fruit trees in profusion, live oaks and eucalypt! The road running immediately into Santa Clara is a trifle rough, though permitting of good going. The town of Santa Clara then opened its arms and received us. Night still hung heavily over the hills and valleys when a few minutes later we stopped before a restaurant in San Jose for breakfast. Yet, ere we had done with the welcome matutinal meal, daylight, with startling suddenness, illumined the universe. A filling moon settled behind

a fringe of trees, its soft, cool glow strongly dimmed.

Being Sunday, San Jose was still asleep when we left at six in the morning headed for Milpitas and Mission San Jose. In the refreshing glory of early morning, we sped through, booming an early greeting from the open exhaust. A few sleepy natives watched our advent and exit, unstirred, smiling. They had chores to do, it appeared—milking, feeding and watering, and all those sorts of rural things.

We came, at length, to Niles, and climbed the canyon of that name, in spite of some unfavorable roads and twisting, treacherous turnouts. In the early morning glow we found it beautiful. Small wonder that it is the scene of such stirring Western motion picture drama. Every imaginable setting is to be found there.

Good roads now, the climb over, and the scant city of Sunol is at hand. We pass swiftly through; one needs but a cursory glance to see it all; but we are immensely grateful for the good road there.

A long expanse of wonderful dirt road next, having turned to the left at a most elaborate "Four Corners," including iron fence and stone gateway, and rows of blue hills and distant vistas of valleys, orchards and more hills set in purple haze yet for the rising sun to dispel. The blase, the passive observer, here take heed, for enthusiasm can remain hushed and dormant no longer. Nature is at her best, and demands admiration and approval; not to see, feel and enjoy this feast for the eye is to cheat the noblest instincts. California and climate both begin with a "c," and "c" can be spelled "see," the three being wholly synonymous. To see is to feel, and having seen and felt, we therefore may enthuse, enthusiasm becoming perpetual. Wherein lies California's charm.

The beautiful, quaint town of Pleasanton is inclined to be Eastern. Its pleasure to the eye, however, involuntarily lifts the foot from the throttle and invites leisurely approval.

On to Livermore and Dublin. Splendid roads and with inspiring panoramas on all sides! The cool air whips into the face and awakens that exhilaration that only early morning and a speeding motor car can inspire.

At Dublin, more highway under construction compelled us to turn to the right toward San Ramon, turning again to the left, which led us through the only unpleasant part of the journey—the Cull Canyon. Dust, ruts, turns and curves, both while climbing and descending to Haywards.

Lake County mountains. America's Switzerland in an S. G. V.

From Haywards over a perfect road to the Foothill Boulevard is all that one can ask en tour. The time was but 10 a. m.; but to us, having traveled constantly since 2 a. m., the day seemed nearly gone. We were the only car going in, while hundreds passed us outbound.

Dusty and tired, but in that contented frame of mind which attends, and only can attend, the finish of the perfect tour in the refreshing open country, the hills and valleys, we caught the eleven o'clock boat, and completed the trip when the ferry disgorged us at San Francisco.

Peninsula Touring

Many pleasant tours in the vicinity of San Francisco invite the motorist to a day's travel. One may roll through the park to the beach, follow the Sloat Boulevard and the Junipero Serra Boulevard to the county road, thence past the cemeteries to the smooth new highway which has lately taken the place of the famous El Camino Real; or, if one is so inclined, he may climb to the Corbett Road, which circles the Twin Peaks, to pursue it to its intersection with the Sloat Boulevard. Again he may tour through the Mission, or bounce over the cobblestones to South San Francisco, and travel that road which mounts the hill through which the railroad tunnel passes. All are interesting, and are sufficient in number to provide variety.

After reaching San Mateo, an inspiring drive in itself, the motorist has the choice of many trips through the hills that lie

between the bay to the east and the Pacific Ocean, occupying the Western position.

Probably the best route of several is to turn at San Mateo to the right to Half-Moon Bay, Arleta Purissima, Lobitas to San Gregorio. Following the coast, from where the view of the ocean is excellent, to Pescadero, one turns there to the east. This road leads to La Honda, to Woodside, and from that point to Redwood City. Following the main road north to San Carlos and San Mateo is a pleasant, speedy trip.

It is not considered advisable at the present time for the motorist to attempt the trip to Pescadero by coming direct to Redwood City, thence to Woodside and La Honda; for the road between Woodside and La Honda is in very poor condition and frightfully dusty. Much heavy hauling has been done over its once good surface, and the result is not exactly pleasing to the nerves, nor easy on springs and tires. Down hill this road is not so bad; but the climb is a hard one.

Touring from San Francisco to Woodside, by way of Redwood City, one may take with comfort and pleasure the road that leads over Kings Mountain. At Kings, the choice of three routes offers, all of which are marked.

Sonoma County mountains. A pleasant vista from an S. G. V.

The "Killarney Colleen," a new type of the town, suburban or long distance touring coupe of the landaulet type, in appearance semi-American, semi-foreign, mounted on famous self-starting, electrically lighted Little Six Premier chassis.

The Good Roads Department

Working Organization of the Lincoln Highway and the General Plan for Raising Funds

We have taken the liberty of presenting as follows interesting information taken from the booklet issued by the Lincoln Highway Association, which has for its motive the complete explanation of the "ideals, plans and purposes" of the Association. It is the reasonable duty of patriotic citizens of this great commonwealth to assimulate these important facts with the idea in mind of doing his share toward a great good to the county and the whole people.

The working organization of the Lincoln Highway Association, which is incorporated under the laws of the State of Michigan, is as follows:

First: A Board of Directors has been elected, consisting of twelve men representing various business interests throughout the country.

Second: There is an Executive Committee comprising five members of the Board of Directors, the places of residence of whom are convenient to the National headquarters. This Executive Committee is clothed with the authority of the directors in the intervals between meetings of the directors.

Third: The officers of the association consist of a president, two executive vice-presidents and three honorary vice-presidents, together with a treasurer and secretary.

Comprised in the organization is a list of founders, made up, in large part, of the original contributors to the fund which will make possible the Lincoln Highway. There is an increasing list of contributing members representing practically all of the States of the Union.

In each of the States traversed by the Lincoln Highway, and in the States contiguous thereto, there is a Chief State Consul. This Chief Consul is the representative of the executive committee and the directors in the commonwealth in which he lives. These Chief Consuls are empowered with the authority to appoint associate or vice-consuls in the counties, cities, towns and villages along the route of the Lincoln Highway.

The organization also comprises a definite number of Consuls-at-Large, whose duties are to represent the Executive Committee in company with the State Consuls throughout the territory along the route of the highway and the natural tributary routes,.

The duties of the Chief Consul of each State, together with the Consuls-at-Large are varied. By various means they are engaged in stimulating interest and arousing patriotic enthusiasm for the Lincoln Highway, to the end that its early completion may be possible. These means comprise interviews, publicity addresses to civic organizations, commercial clubs and good roads organizations, and in educating the public generally to a full realization of the Lincoln Highway; and to instil in the minds of the younger generation reverence and honor for the name of Abraham Lincoln.

Through the co-operation of these State Consuls and Consuls-at-Large, the directors of the association hope to complete the fund which they are seeking to raise by the first of July, 1914. Their belief is that if this fund be completed by that time, some of the sections of the Lincoln Highway can be improved and made available for the many thousands of Eastern tourists who are now planning motoring trips to the Pacific Coast, with the Panama-Pacific Exposition as the objective.

Upon completion of the ten million dollar fund, one-half of which has been nearly raised, the directors believe that three years of actual construction will be required to finish this great highway of traffic, and make it possible to tour from New York to San Francisco in comfort in fifteen days of leisurely traveling.

On the first day of September, 1913, the census returns show that there are approximately one million automobile owners in the United States. It is a part of the duty of each Consul to secure as a contributor each motor car owner whom he knows, or with whom he can communicate, in the hope that this great body of good roads enthusiasts may be enrolled as contributors to this great, enduring and useful memorial to Abraham Lincoln.

Among the plans for securing the funds necessary to complete this great route are the following:

A large number of automobile manufacturers, manufacturers of sundries, parts, tires, etc., have already contributed on the basis of one per cent of their gross sales for the period of one year, with the understanding that the payments made may extend over a period of three years. Many of these subscriptions are guaranteed as to amount. The cement industry of the United States, representing approximately thirty-eight constituent companies, has voluntarily contributed of their output one million five hundred thousand barrels; hundreds of individuals and concerns throughout the country already have pledged definite sums ranging from $100 to $10,000. The publishers of practically all of the automobile journals in the United States have contributed of their space to a broad, nation-wide advertising campaign.

By these means, and as a supplement to the efforts of the State and Chief Conculs, it is believed that the great mass of automobile owners will rally to the support of this association and contribute $5 each. As an evidence of their contribution, each is to receive an engraved certificate, a radiator emblem to be attached to the motor showing in outline the United States, together with the route from New York to San Francisco, or a beautifully engraved plate for the dash and a card of membership in the association. The radiator emblem is provided with loops or lugs in order that it may be conveniently attached to the radiator of the car. It is hoped that every automobile owner who reads this declaration, and who is interested in seeing the construction of a trans-continental highway, one which will permit our thousands of tourists to "See America First," will demonstrate his patriotism by contributing the small sum named—$5.00.

Statistics have recently been prepared which show that many million dollars

were spent by automobile tourists in the New England States during the season of 1912. This great outpouring of wealth by the leisurely, pleasure-seeking class of our populace demonstrates conclusively what good roads will do for any particular section of the country. The directors of the association are firm in the belief that when the Lincoln Highway is completed and usable by the touring public, the many millions of dollars annually expended by our citizens who tour the British Isles and Continental Europe will be diverted and the tide of travel directed across these United States.

Road Construction About San Francisco

Sonoma County.—According to advice received by Motor Magazine from the State Highway Commission, along the main traveled route the road construction work is confined to a stretch of highway about thirteen miles long between Santa Rosa and Healdsburg, close to Windsor. Turnout signs have been provided here, and in the main are very passable. The motorist should experience no difficulty if he observes the signs closely, on which given directions appear. In the neighborhood of Corte Madera, for several miles the road is under construction. This stretch of highway will soon be open, however.

Marin County.—Roads in Marin County are at present undisturbed by State Highway construction work, and are in reasonably good condition.

On this side of the bay, down the peninsula, the road is finished between Baden and Burlingame. At Burlingame it is advisable to turn to the left and go through the town, and also through San Mateo, then to join the highway again just beyond. The turnouts here are plainly visible, and no difficulty should be experienced.

After Redwood City, turn to left to Middleford. Proceeding to Palo Alto, follow temporary dirt road south paralleling the railroad to a point below Mayfield. Here turn to right, and soon join old road. Follow "Road Closed" signs directing traffic to side roads as far as Mountain View. There one may take the finished State road to Milligan Corners, south of Sunnyvale. Turn to the right here, leaving the main road. Turn again to left, passing through Santa Clara and San Jose.

South of San Jose the road is under construction all the way to Gilroy. The turnouts are distinctly marked. The first occurs one mile south of San Jose, and continues for one mile in the vicinity of Coyote, then one mile immediately south of Morgan Hill.

From Stockton to Fresno the road is torn up in four places, but turnout signs here direct the traveler properly. From Fresno to Los Angeles the road is not torn up.

Between Oakland and Stockton no State Highway construction work is underway at the present time.

Motorists are cautioned to follow the turnout signs carefully, for by so doing they may save themselves much time and trouble. It is frequently possible to pass the first barrier, but sooner or later the motorist will find himself blocked and be forced to turn. The contractors are required to provide lanterns at night to mark the turnouts properly.

Work on State Highways is going forward as rapidly as possible until more road bonds are sold. The bond market is expected to be considerably improved now with a greater showing by the commissioners attending.

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The Fifth Transcontinental Route

The most spirited competition ever encountered by the American Automobile Association in laying out and developing five different transcontinental routes has been in Texas, the entire length of which has just been traversed from west to east by W. O. Westgard, of the association's field staff. Great importance is lent to this particular trip—the longest of all and the only one that can be traveled throughout the year—because the largest share of road improvement throughout that territory is likely to be along the line carefully selected by this routing and mapping expedition.

From El Paso on the Rio Grande, the route finally chosen passes through Alamagordo, Roswell, Sweetwater, Abilene, Mineral Wells, Fort Worth, Dallas and Paris, to Texarkana on the Arkansas River, the Texas-Arkansas border. Surprisingly good natural roads were found for hundreds of miles, while other long stretches were seen to need considerable improvement to fit them for the large amount of travel certain to come by 1915. Along the entire line the people of the Lone Star State were enthusiastic over the new through route, and pledged their support toward its building and maintenance.

Concerning the Pacific Coast Highway

That the Pacific Coast Highway, planned to extend from Vancouver, B. C., to Lower California in Mexico, is well under way, and will be practically finished from British Columbia to San Francisco by the first of 1915, is the announcement made by Samuel Hill of Maryhill, Wash., at the Hotel St. Francis recently. Hill has just returned from his thirty-eighth visit to England and Europe, and during this last trip spent several weeks inspecting the public roads of France, Belgium, Germany and Great Britain. Besides being president of the Pacific Highway Association, he is honorary life president of the Washington Highway Association, and president of the American Road Builders' Association. The latter organization comprises nearly all the practical road builders of the United States and Canada.

"Washington and Oregon are showing an activity in road-building never before witnessed in any other State," said Hill. "Jackson County, Oregon, has voted $500,000 for road construction, and turned the building work over to the State. Multnomah County (Portland) has authorized the building of a road along the Columbia River forty-five miles long. Julius Meyer, president of the Columbia Highway Association, has arranged with all the counties along the Columbia River to turn over to the State the work of building a highway from the south bank of the Columbia to the sea.

"I expect to see a highway hard surfaced through British Columbia and Washington, and an improved earth road hard-surfaced in part, through Oregon, built to the California State line by the early part of 1915, in time for the Exposition.

"What we are trying to do is to bring the three Coast States and British Columbia into closer contact, so they will work in harmony. Heretofore, Seattle, Portland and San Francisco have acted like children. Seattle tried to build over the Cascades east, and that road is only open sixty days a year. Portland insisted on building over the mountains, and I found snow on the ground on the second day of last May. San Francisco and California tried to ignore the forty-two miles of snowshed, and the experience of all the railroads, and has only recently realized that good roads can be built to the northeast and southeast, but great difficulties will be encountered in building directly east

"California has the most beautiful winter climate in the world to sell; Na-

ture makes it fresh every year, and all she has to do is to open the way, so the roads can be used in the winter. Other people have a summer climate, but California has a monopoly on winter climate."

Shell Roads of Galveston County

In the southernmost part of Texas lies Galveston County. On Galveston Island, in the Gulf of Mexico, lies the city of Galveston. From the city and county of Galveston have emanated reports of municipal improvements and commercial growth that have caused the eyes of the world to center upon Galveston. Galveston credits her unsurpassed record of achievement to the willingness of her citizens to assume reasonable responsibilities through bond issues for permanent improvements. Little more than a decade ago, Galveston built a seawall five miles long, costing $62 a lineal foot, or a total of more than $1,500,000. Galveston then spent $2,000,000 to raise herself permanently above flood level. Another $2,000,000 was expended in the erection of a concrete two mile causeway connecting Galveston Island with the mainland.

But the seawall, the causeway and Galveston's splendid system of shelled streets were attractions unavailable to auto tourists because of the absence of good county roads. The county of Galveston then proceeded to issue bonds in the sum of half a million dollars for road betterment. Millions of humble oysters, long deceased, furnished the material that crowns the Galveston County shelled roads, and the few feeders constructed by means of the original bond issue. Galveston at once became a Mecca for auto tourists, and throughout the year visiting autos swarm over the city. The benefits derived from the roads established through the first bond issue created a hunger for more and more shelled roads, and on September 26, 1913, the taxpayers of Galveston County bonded themselves to the extent of an additional $250,000 for the construction of feeders to the main roads already built.

The expenditure of this money will make the shelled road system of Galveston County one of the finest in the world, and will doubtless be justified through immediate good results. These roads will form the last lap of the Colorado to the Gulf Highway, the terminus of which will be the seawall boulevard at Galveston. If the plan of the Galveston Commercial Association carries, involving the working of State convicts on county roads, no available piece of road in the county will be left unshelled.

You really *ride* on
Goodrich Tires

SEVENTY-FIVE per cent of your enjoyment and comfort in motoring depends upon your perfect confidence in your tires.

Quality of rubber and fabric and quality of workmanship, together with the Goodrich principle of unit molding, combine to make you realize that you really ride on

GOODRICH UNIT MOLDED TIRES
BEST IN THE LONG RUN

Your Goodrich dealer is ready to supply your wants today. Goodrich service covers the country from coast to coast. A satisfied customer is our best advertisement and we mean to keep you satisfied.

Write for the Goodrich Route Book, covering the auto tour you select. These books are sent free on request.

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Everything That's Best in Rubber

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There is nothing in Goodrich Advertising that isn't in Goodrich Goods.

Early Entries in Five Hundred Mile Race

That the 500 mile Motor Speedway classic is the one and only race of the year has been proven beyond a doubt by the fact that makers and private owners already are entering cars for the fourth annual 500 mile International Sweepstakes race which will be held at the Indianapolis Motor Speedway, May 30, 1914. The Stutz Company, of Indianapolis, always among the first to support the event, has entered two cars, which, from their showing in recent road races, cannot help but be considered real contenders. Harry Thompson, of Battle Creek, Mich., the sportsman who entered the Anel, which Billy Liesaw drove last year, has come to the front with an entry. He says the car will be called the Anel Special, but will be entirely different from the car which raced last year.

Mr. Thompson was an interested spectator at the recent Elgin races, and sat in the press stand watching the cars. At his side was Charles W. Sedwick, Speedway manager. During a conversation with Mr. Sedwick, Thompson remarked that he viewed the Indianapolis race as the greatest in the world, and promised the first entry. He was more than anxious that his car be the first entered, and asked that if such was the case that he be given No. 1. His car has been entered, and will bear that number. He asserted at the time of the conversation that No. 1, although thought to be the bearer of bad luck by many drivers and owners, had no terrors for him, and that he would consider it an honor for his car to bear the number over which the "jinx" is said to hover.

Harry Stutz, of the local concern, which has made such a remarkable showing in racing history, was right on the heels of Thompson with his entries for two cars. With a car which has made racing history, and which, but for an unavoidable accident, would have carried off honors second to Goux in his Peugeot last year, Stutz is a national figure wherever racing is known. He is one of the men who is known as a true sportsman, and is just as good a loser as he is a winner.

The Stutz concern had three cars in the race last year. Don Herr, who drove No. 8, went out early with clutch trouble, but the other two cars were contenders throughout the race. Charley Merz was the driver who finished in the money and provided the big feature of the event, driving the last lap with his car ablaze. And that was not all the Stutz contingent provided. The one bit of hard luck equaling that of DePalma in the 1912 race was a Stutz offering. Gil Anderson, picked as the logical driver for one of the entries next May, was the recipient of a blow of Fate. In second place, with only a few laps to go, and with $10,000 almost in his grasp, a small screw in the fan dropped out and fell into the only place where damage could be done. Consequently Anderson was unable to start his car after a last stop at the pits, and saw a sure second place go to another.

The second Stutz entry probably will be driven by Earl Cooper, the driver who has set the West on fire with his cleverness in the various road races. Between Cooper and Anderson, the Stutz cars have captured seven out of eleven of the season's races. Two of these events were for small cars, and the Stutz was not eligible. In the other events, the big white cars have breezed home in the lead in all but two. In one of the latter events the Stutz entry was a private one unknown to the factory, and driven by an amateur pilot. The record for the season gives the Stutz the title of the champion road race car and makes it a real contender, and one which will be feared in the coming event. With two such pilots under the guidance of Harry Stutz, known as one of the best race team managers in the country, the cars with any sort of luck should be in at the finish.

Thompson says his car will be a contender this year, and is planning the construction of the speed monster with extreme care. Nothing will be left undone to make the creation the best that can be built, and as speedy as the best. Not only does Thompson believe in having the right kind of a car, but he is going after the best of drivers.

Just who will be at the wheel of the car has not been determined, but the Michigan man is after the winner of the 1912 race, Joe Dawson. The local boy drove the Deltal into second place in the first day's even at Elgin this year, and was still running in a Marmon in the big Elgin National when the race was called. His Speedway victory in the National in 1912 long will be remembered, for he holds the track record, which the pick of foreign and American cars failed to lower last May. If Dawson finds it impossible to drive, it is said that "Wild Bill" Endicott will have the next call. Bill is one of the older racing drivers, and has competed in most of the local events. He probably has done more racing than many of his fellow pilots, for he drives throughout the year, on dirt tracks, speedways and beaches.

Speedway officials are enthusiastic at the early entries, and prophesy that others will be coming in before long. Numerous entry blanks were mailed out recently, and the coming race is expected to be bigger and better than ever. The foreign car victory of last year is bound to enthuse the French, English, German and Italian makers and drivers, and the cream of the old country's racing cars and crews is expected to be here early for the practice season.

According to Mr. Sedwick, everything points to an early closing of the entry list, as it is thought the limit will be reached much earlier than last year. Inquiries concerning the race are being received daily, and the manufacturers seem to be showing more interest than ever before.

One big question which already is agitating the fans is the possibility of the return of the previous winners, the Marmon and National cars, both Indianapolis-made products. Opinions are divided on the subject, but there seems to be an even chance that one or both makes of cars will be entered.

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——President W. J. Clemens of the Portland Automobile Club, which is assisting in drafting a new automobile ordinance, stated that an effort would be made to pass a limit on the age of drivers. The State law forbids the driving of a car not privately owned by any person under eighteen years of age. It is planned to have the Portland ordinance prohibit boys younger than 18 driving any car.

The Lincoln Highway and California

THE Panama Canal will tend wonderfully toward the development of the Pacific Coast, particularly California. The Lincoln Highway is the next great step in this development. The appeal for assistance is nation wide; the appeal to California is direct and significant. Patriotism is best expressed in a fusion of effort. California, as the terminus of the Highway, should therefore be quick to respond.

Calendar of Events in Motordom for 1913-1914

October 27-28.—Fourth Annual Convention Electric Vehicle Association of America at Chicago, Ill. Harvey Robinson, Secretary, 1170 Broadway, New York City.

October 18-November 2—Dallas, Tex. Automobile Show. State Fair. Dallas Auto Dealers' Association. D. F. Stafford, Mgr.

November 2-3—Los Angeles to San Diego, Cal, to Phoenix, Ariz., Road Race.

November 3-8—Chicago, Ill. Second Annual Motorcycle Show. Coliseum. A. B. Coffman, Nicholas Bldg., Toledo, O., Chairman.

November 4-5—El Paso, Tex. Road Race to Phoenix, Ariz.

November 4-5—San Diego, Cal. Road Race to Phoenix, Ariz.

November 6—Phoenix, Ariz. Track Races, State Fair.

November 7-15—London, England. Automobile Show, Olympia.

November 8-12—Shreveport, La. Track Races. J. A. Sloan.

November 8-15—Atlanta, Ga. Automobile Show. Atlanta Auto and Accessory Association. Auditorium Armory.

November 24—Savannah, Ga. Automobile Show.

November 24—Savannah, Ga. Vanderbilt Cup Race. Savannah Auto Club.

November 27—Savannah, Ga. Grand Prize Race. Savannah Auto Club.

December—Newark, N. J. Automobile Show. Armory Building. New Jersey Auto Trade Association.

December 9-12—Philadelphia, Pa. Annual Convention of American Road Builders' Association.

January 3-10, 1910—New York City. Automobile Show. Automobile Chamber of Commerce. Pleasure cars. Grand Central Palace. S. A. Miles, Mgr.

January 2-10—New York City. Automobile Salon of Imported Cars. Hotel Astor. S. Kjeldsen, secretary.

January 10-16—Milwaukee, Wis. Automobile Show.

January 24-31—Chicago, Ill. Automobile Show. Pleasure Cars. Coliseum and First Regiment Armory. Automobile Chamber of Commerce, New York City. S. A. Miles, Mgr.

January 24-31—Rochester, N. Y. Automobile Show. Exposition Park. Rochester Automobile Dealers' Association. C. A. Simmons, Mgr.

January 26-31—Scranton, Pa. Automobile Show. Armory. H. B. Andrews.

January 31-February 7—Minneapolis. Minn. Automobile Show. Minneapolis Auto Trade Association. National Guard Armory.

February—Elmira, N. Y. Automobile Show. Armory. Automobile Show Committee. Frank D. Pratt and M. Doyle Marks.

February—Fort Dodge, Ia. Automobile Show. Armory. Automobile Dealers' Association.

February 2-7—Buffalo, N. Y. Automobile Show. Pleasure Cars. Buffalo Automobile Dealers' Association. John J. Gilson, 401 Franklin St., Buffalo, N. Y., Secretary.

February 7—Omaha, Neb. Automobile Show. C. G. Powell, Secretary, 2119 Farman street.

February 9-14—Buffalo, N. Y. Automobile Show. Commercial Cars. Buffalo Automobile Dealers' Association. John J. Gilson, 401 Franklin street, Buffalo, N. Y., Secretary.

February 18-21—Bloomington, Ill. Automobile Show. McLean County Automobile Club.

February 21-28—Newark, N. J. Automobile Show. New Jersey Automobile Trade Company. R. B. Mann, Secretary, 37 William street.

February 24-March 1—Cincinnati, O. Automobile Show. Cincinnati Auto Dealers' Association.

March—Grand Rapids, Mich. Automobile Show. Grand Rapids Herald. Klingman Furniture Building.

March—Wichita, Kan. Automobile Show. Wichita Business Association.

March 7-14—Boston, Mass., Automobile Show. Pleasure Cars. Mechanics' Building. Boston Automobile Dealers' Association. C. I. Campbell, Mgr.

March 17-21—Boston, Mass., Automobile Show. Commercial Cars. Boston Commercial Motor Vehicle Association. C. I. Campbell, Secretary.

April 9-15—Manchester, N. H. Automobile Show. Mechanics' Hall. D. F. Sullivan.

May 30—Indianapolis, Ind. 500-mile Sweepstake Races. Indianapolis Motor Speedway.

News of the National Shows

The dates for the two National automobile shows to be held next winter in New York and Chicago have been decided upon. The New York exhibition will be held in its entirety in the Grand Central Palace during the week of January 3-10. The Chicago exhibition will be held at the Coliseum and First Regiment Armory as formerly, the date being January 24-31. Each exhibition will be conducted under the auspices of the Automobile Chamber of Commerce, and each will be confined to passenger vehicles. This will be the first time one association has been in actual control of both exhibitions since the Selden-Patent litigation matters divided the membership of the N. A. A. M. into two camps which brought about several shows.

Madison Square Garden, which has been the home of the New York show for many years, proved itself inadequate for exhibiting the products of the automobile industry, and last year the exhibition was held in both the Garden and Grand Central Palace. The Grand Central Palace, a magnificent show building, will this year house the entire exhibition, and the space which has been secured is greater by far than that which was utilized in two buildings last year. Four floors of the Palace will be used for the exhibits and the additional space over that which was had last year is 50,000 square feet, which will afford a comfortable housing for all exhibitors.

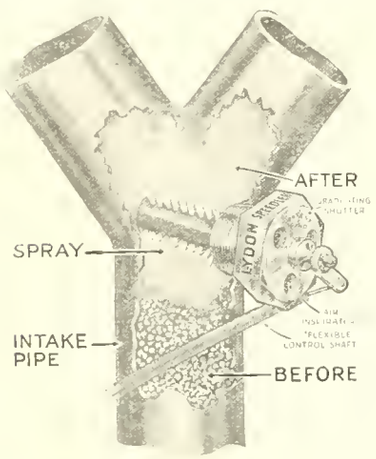
For the Chicago show, the gallery of the Coliseum will be extended at the sides and each end of the building will be lengthened by 24 feet, this arrangement adding 5,000 more feet of space for the exhibits. The aisles will extend around the inside of the balcony instead of the outside as heretofore, so that the exhibition space will be given greater depth.

Motorists are pleased with the idea of utilizing only one building in New York for the show, and also the fact of having the New York and Chicago exhibitions under one management, for this will result in saving many thousands of dollars to the trade and space rentals will cost less than in former years. S. A. Miles, general manager of the Automobile Chamber of Commerce, is busily engaged on the plans for both exhibitions, and he expects that application blanks and diagrams will be issued by September 1. Applications for space and diagrams and other information can be had by writing to the Automobile Chamber of Commerce, 7 East 42d street, New York City.

NEW THINGS FOR THE MOTORIST

THE NEW SPEEDLER.

Among the gas savers on the market there is one called the Speedler, which is new to Coast motorists. The device, when inserted in the intake manifold, sprays gas into the cylinders, thus perfecting the work of the carbureter. The use of the Speedler, it is claimed, makes for economy in the use of gasoline, increases the power and speed. The Speedler also acts as an air brake when neces-



sary, and when in use for this purpose cools the engine and fits it for the next long climb.

The spray mixture, when fed into the firing chambers, is more combustible. It is said to remix the mixture of air and gasoline with atomizing thoroughness, and therefore flames quicker on the spark. The Lathan Auto Supply Company have the agency for the Speedler on the coast.

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THE EAGLE CLAW WRENCH.

The Eagle Claw Wrench is a new boon to the automobilist, designed to do the work of all wrenches and yet work which no other tool can do. This wrench will easily hold a round-headed bolt, by the head, to prevent it from turning while unscrewing the nut. It will act as pliers, and does work more effectively, such as holding round, square, oblong, hexagon or other shaped objects firmly. The wrench is one of the handiest tools to have around the car. It will not slip on

oily, slippery grease cups, and gets a firm grip on set or lag screws, no matter how round or worn the corners are.

For taking hold of spring bolts in case a spring leaf breaks, the Eagle Claw Wrench is unexcelled. It is designed and constructed for use in difficult places where it is impossible to use any other wrench. The wrench comes to San Francisco through the Lathan Auto Supply Company.

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A CARBON REMOVER.

In the discovery of Wallin's Hydro-Carbon Oil Compound, a practical and scientific process for the removal of carbon from gasoline motors without tearing them down or without fear of injury to any of its parts. Hydro-Carbon Oil Compound is a chemical process with an oil base, containing no free acids, and is endorsed by the leading automobile manufacturers throughout the country. The process of removing carbon with this compound is very simple, requiring but an hour for the work. Hydro-Carbon Oil Compound saturates and burns up the carbon soot, and resinous matter in an engine, thus restoring compression and valve action. The composition of chemicals used in this compound liberates all the chemicals and converts carboneous

ZEROLENE

The Standard Oil for Motor Cars

The perfect lubricating oil sold in the flat-shaped can—easy to handle. It fits readily in the tool box.

Sold by dealers everywhere and at all agencies of the

STANDARD OIL COMPANY
(CALIFORNIA)
SAN FRANCISCO

substances into smoke. This carbon removing compound is to be had of the Chanslor & Lyon Company.

THE FORD AUXILIARY WATER CIRCULATOR.

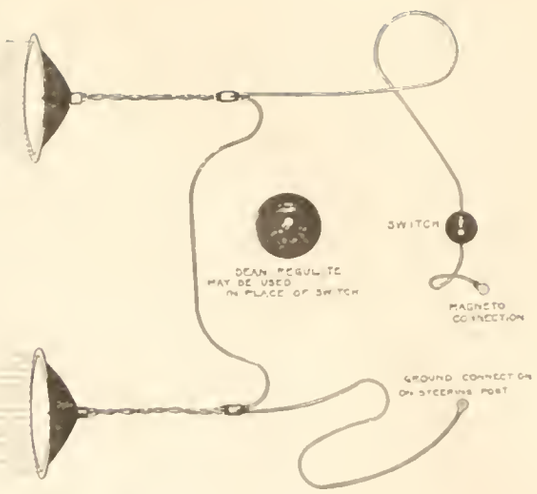
A new water pump to act in an auxiliary capacity to the thermo-syphon cooling system on Ford cars has just been exhibited locally. The auxiliary water pump attaches to the motor very conveniently, and forces the water from the cooling chamber into the radiator when it cools. The pump is very practical,

and serves a good purpose. Two views are shown here in accompanying cuts—one of the pump itself, and when attached to the Ford motor.

FORD ELECTRIC LIGHTING ATTACHMENT.

An electric lighting system, very complete, ready and easy of attachment to Ford cars has recently made its appearance on the Coast. The lighting system is very simple and requires but little work to install it on the car, and make the proper connections with the magneto, from which the lighting current is drawn.

For some time there has been a demand for an attachment of this nature that would prove suitable for furnishing electric lights on Ford cars. The electric light fittings include reflectors, switch, Dean regulator, which governs the flow of current, and all necessary wiring. The Ford electric lighting attachment is handled in San Francisco by the Lathan Auto Supply Company.



A NEW MOTOR OIL.

De Luxe Oil is a late lubricant to be had in San Francisco. This oil is compounded of McKean County, Pennsylvania, crude oil, which is known the world over for its freedom from carbon. McKean County oil, in consuming, gives off a soft carbon in small amounts, which blows out very readily. Pure Pennsylvania oil is very suitable to the California climate. De Luxe oil has a fire test of 480; flash 460; gravity 26-30, and the viscosity is 45 at 212 degrees. This oil is distributed by the De Luxe Oil Co., of San Francisco.

LARKINS & CO.
Carriage and Automobile Body Builders
Established in 1865
Announces the removal of their Offices and Factory to
1610-1612-1614 Van Ness Avenue
Between California and Sacramento Sts.
Phone Prospect 30
Where their entire attention will be devoted to the prompt delivery of the best work that a modern plant, high-class mechanics and materials can produce.

EMPIRE
Model 31
"The Little Aristocrat"
Completely Equipped $950
The Completely Equipped Empire five-passenger touring car $950—Equipment includes Mohair Top and Top Envelope, Demountable Rims, Rear Double Tire Irons, Extra Rims, Accelerator, Windshield, Prest-O-Lite tank, Horn and Speedometer.
The Empire Automobile Co. Indianapolis, U.S.A.

Phone Sutter 300 Pacific Sightseeing Co., Prop.
FOURTH ST. GARAGE
FOURTH & HARRISON STS.
SAN FRANCISCO
Commercial Trucks A Specialty
Automobile Supplies
The attention of owners of pleasure cars living in San Mateo County is called to the convenience of this Garage to Third and Townsend Street Depot.
THE LARGEST GROUND FLOOR FIREPROOF GARAGE WEST OF CHICAGO

AUTOMOBILES AND TOURISTS' BAGGAGE
INSURED AGAINST
Fire, Theft and Transportation
While anywhere in United States, Canada and Europe
ÆTNA INSURANCE CO.
OF HARTFORD
PACIFIC BRANCH—325 California Street, San Francisco

STORE YOUR AUTOMOBILE
Convenient to All Downtown
HOTELS — CLUBS — THEATRES
COLUMBIA GARAGE
655 GEARY ST., near Jones. Phone Franklin 544
Day and Night Washing and Storage—Supplies—Tires
Machine Shop—Vulcanizing—Electrics

Tips to Automobilists

(CUT THIS OUT.)

The News Letter recommends the following garages, hotels and supply houses. Tourists will do well to cut this list out and keep it as a guide:

SANTA CLARA COUNTY.

SAN JOSE.—Stop at LETCHER'S New Garage for first-class service. We cater to the touring public. Attractive parlors for ladies in connection. "Mission Front" garage next to corner of First and St. James Sts.

SAN JOSE.—Lamolle Grill, 36-38 North First street. The best French dinner in California, 75 cents, or a la carte. Automobile parties given particular attention.

PALO ALTO.—PALO ALTO GARAGE, 443 Emmerson St. Tel., P. A. 333. Auto livery at all hours. Tires and sundries in stock. Gasoline, oil, repairing, lathework, vulcanizing. Open day and night.

PETALUMA.—PETALUMA GARAGE AND MACHINE SHOP. Sparks & Murphy, Props. Cor. Third and C Sts; Phone Main 3. Automobiles, general machine work and gear cutting; supplies, repairing, auto livery; lubricating oil and gasoline, the care and charging of storage batteries.

HOTEL VENDOME
SAN JOSE, CAL.
Headquarters for Automobilists touring the beautiful Santa Clara Valley.
American and European Plan. Reasonable Rates.

Changes in the Trade

John F. McLain, who has been identified with the Franklin factory as its Western representative since 1907, has purchased from the Franklin Company its entire Northern California business. Former factory branches in San Francisco and Oakland will in the future be conducted by the John F. McLain Company.

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C. A. Gilbert, manager of the Western division of the United States Tire Company, announced recently that the United States Tire Company of New York, owners of the United States Tire Company and the Gorham-Revere Rubber Company, had decided to merge these two concerns with the United States Tire Company of California. The new corporation will have charge of the New York Company's affairs on the Coast.

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Having recently discontinued their San Francisco branch, the F. B. Stearns Company will be represented in this city in the future by the Argonaut Motors Co.

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It has been recently stated that Baker & Hamilton will control the distribution of Savage Automobile tires in the San Francisco territory.

The Bonnheim-Moore Company will handle the distribution of Maxwell cars in this section of the State. The announcement of this change was made recently by J. J. Toner, Western representative of the Maxwell Motor Car Co.

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The San Francisco branch of the Thos. B. Jefferys Company has been purchased by a company headed by I. I. McMullin. This new company will control the northern territory.

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What a Cycle Car Is

What is a cycle car?

That is the question which motorcyclists and prospective motorists are asking to-day. The cycle car is a transition between the motorcycle, tricar and the Ford, which may be considered to hold the premier place among low-priced automobiles. But just what is this intermediate type of car, you ask? It is at present in a state of evolution in this country, and to a certain extent also evolving in Europe. For that reason no fixed definition of the cycle car can be set at this time. A tentative one, however, has been proposed by "The Cycle Car," an English trade paper, which gives the following definition:

"The cylinder capacity of the cycle car must not exceed 1,100 cubic centimeters (approximately 67 cubic inches.) The chassis weight must not exceed 6 cwt. (672 pounds) inclusive of the weight of the tires; or, in the case of those vehicles the bodies of which are not separable from the chassis, the total weight, all on and ready for the road, but without fuel, oil or water, must not exceed 7 cwt. (784 pounds.)

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The best boost for the Lincoln Highway is to contribute something to the rapidly swelling fund to be devoted to its immediate construction.

STATEMENT OF THE OWNERSHIP, MANAGEMENT, CIRCULATION, ETC.

Motoring Magazine and Motor Life, published monthly at San Francisco, required by the act of August 24, 1912. Editor, B. Davidson, 21 Sutter St., San Francisco. Business Manager, F. A. Marriott, 21 Sutter St., San Francisco. Publisher, Frederick Marriott, 21 Sutter St., San Francisco. Owner, F. Marriott, 21 Sutter St., San Francisco. Known bondholders, mortgagees and other security holders, holding 1 per cent or more of total amount of bonds, mortgages or other securities: None.

F. MARRIOTT, Owner.

Sworn to and subscribed before me this 19th day of September, 1913.

MARTIN ARONSOHN, Notary Public in and for the City and County of San Francisco, State of California.

(My commission expires September 20, 1915.)

Keenan Brothers

Machinists
and
Engineers

AUTOMOBILE REPAIRING
A SPECIALTY

350 GOLDEN GATE AVE., bet. Hyde and Larkin Sts.
PHONES
Franklin 6823 Home J 2012

Samson
And
Peerless
Inner Shoes

Endless in shape and strength. Guarantee you double mileage and insure your pleasure.

Agents wanted everywhere, liberal inducements.

Jackson-Eno Rubber Co.
Los Angeles, Cal.
Manufacturers of Rubber Tire Sundries

Cheer Up!

"You look happy this good morning," said one.

"Happy? I have the habit," responded the other; "feel like the brightest June day God ever let the sun shine on. Old troubles and worries gone—killed them all. I'm the happiest murderer alive. Can't explain except that I discovered that Misery wasn't worth while, and I wrung its neck. In the last two months I have found things in life I never knew were there before. And the petty, annoying things are dead—every one of 'em. My wife first thought I was sick, then crazy; now she has the virus herself. Business is better, home is happier, life is sweeter. Medicine? Not on your life. I have always been troubled with too much good health. It wasn't that. Religion? No, not that either. It's just plain emancipation—a casting away of the things that hung heavy on my heart, in order to give it a chance to receive and enjoy the worth-while things that come my way. I tell you, man, it's great"—and he smiled beamingly as he left the car.

Emancipation! That's the word. Freedom is self-made. It cannot be given by any act of Congress, or taken away by any tyranny. The liberty to enjoy life is innate. Whether one is happy or unhappy depends upon his own will.

Misery is a disease of the will. Joy comes by willing to be joyous.—*Ford Times.*

All the Same Franklin

Robert Owen was "the father of modern business"—the world's first great business man. He invented the one-price system. He made it pay—therefore, it survived. Go back to the beginning of most of our best business methods of to-day and you go back to Robert Owen—who made a fortune at which even our moderns would not sneeze—and who died only a little more than fifty years ago.

Also, Robert Owen invented the trade mark.

It is related that when Owen went up to New Lanark to buy a cotton mill owned by David Dale, he met Mr. Dale's daughter. She acknowledged the introduction by saying:

"So, you're the man who puts his name on the package?"

You see, the trade mark was doing its work.

"You must be proud of your name," she continued.

"Wouldn't you be?"

"Not of yours!" she snapped.

But later she thought better of the suggestion, for she became Mrs. Robert Owen.—*Ford Times.*

What Good Roads Mean

Good roads mean more cultivated farms and cheaper food products for the toiler in the cities; bad roads mean poor transportation, lack of communication, high prices for the necessaries of life, the loss of untold millions of wealth, and idle workmen seeking employment. Good roads will help those who cultivate the soil and feed the multitudes, and whatever aids the producers and the farmers of our country will increase our wealth and our greatness and benefit all the people. We cannot destroy our farms without final decay. They are to-day the heart of our national life and the chief source of our material greatness. Tear down every edifice in our cities, and labor will rebuild them, but abandon the farms and our cities will disappear forever.—*Governor Wm. Sulzer.*

What California Is Doing

In addition to the State system of highways now being constructed in California under the $18,000,000 bond issue, several other State roads are provided for by recent legislation. Appropriations were made totaling $115,000 for construction and maintenance of special highways; of this, $70,000 is for building a road from Saratoga Gap to Redwood Park, which will allow tourists traveling over the Coast route or through the Santa Clara Valley to easily make the run to the park. Other roads to be improved from the appropriation are the Myers-McKinley highway, along the west side of Lake Tahoe; the Trinity-Humboldt road; the Emigrant Gap road; the Alpine road; and the Placerville road to Lake Tahoe. Other legislation permits the State to pay one-third the cost of a county road, when requested by a majority of four-fifths of the members of the County Board, the amount not to exceed $50,000 in one year in any county.

What Could Be Saved

A thorough system of good roads would strike an immense blow at the high cost of living, and this, of course, would be added to whatever motors can be substituted for horseflesh. It is not too much to say that if modern methods for handling package freight can be substituted for the medieval procedure that now goes on in railroad freight sheds, transfer wards and terminals, and if our railway stations were all accessible by good roads an amount equal to the annual expense of this government, plus the national debt and the expense of all our States, could probably be saved every year.—*Secretary of Commerce Redfield.*

Auto Licenses by the Ton

An order for 200,000 1914 automobile number plates and 20,000 motorcycle plates, of an aggregate weight of 105 tons and amounting in mass to from four to six carloads, was awarded to-day by H. A. French, purchasing agent of the State Engineering Department, to the California Metal Enameling Company of Los Angeles. The contract, which illustrates the standing of California as a Mecca for automobiles and motorcycles, amounts to $38,800.

The plates are to be furnished in pairs to owners of machines when they register with the department for 1914, under the new act, which changes the system of registration and requires the payment of taxes on a horsepower basis. A bright red background with white figures is to be the distinguishing characteristic of the 1914 automobile and motorcycle plates. These colors will be changed in 1915, as the law provides for annual registration hereafter. Under the new law, which goes into effect January 1, 1914, each automobile and each motorcycle must have two number plates, permanently attached to the machine, one in front and one in the rear, with a clearance of sixteen inches above the ground. Swinging plates will not be permitted after January 1st, and the rear plate must be attached where the rear light can shine upon it. The automobile plates will be of a size to accommodate six figures, and will be $5\frac{1}{2}$ inches wide and 16 inches long.

May It Be Soon

That plans are well under way for the transformation of the Great Highway into an esplanade along the ocean front was the report made to the Mayor and the Board of Supervisors recently in response to a question by Supervisor Andrew Gallagher. George Gallagher said that the Street Committee and Finance Committee had well under way plans for permanently paving the great Highway from Sloat Boulevard to the county line. In addition, the Sloat Boulevard is to be improved and paved from Junipero Serra to the ocean. Supervisor McCarthy added that if finances permitted, two boulevards are to be built around Twin Peaks. Some of the work is dependent upon the amount received by the city from the State automobile license tax, which has been variously estimated at $50,000 to $75,000.

Leading American Cars

AMERICAN UNDERSLUNG

American Motors California Co.
476-482 Golden Gate Ave.
San Francisco

Prices F. O. B. Factory

Models			Prices
422	4 Cylinder, 2 Passenger	30 H. P.	$ 1550
612	6 Cylinder, 2 Passenger	60 H. P.	2750
614	6 Cylinder, 4 Passenger	60 H. P.	2750
616	6 Cylinder, 6 Passenger	60 H. P.	2950

COLE

PACIFIC MOTOR CAR CO.
Golden Gate Avenue and Polk St., San Francisco
Prices F. O. B. San Francisco.

Models—	
4-cyl. 2 Pass. Roadster	$2050
4-cyl. 5 Pass. Touring	2050
4-cyl. Coupe	2500
6-cyl. 2 Pass. Roadster	2750
6-cyl. 4 Pass. Demi-Tonneau	2750
6-cyl. 7 Pass. Touring	2750
6-cyl. Coupe	3150
6-cyl. Limousine	4150

HUDSON

H. O. HARRISON
1035 Van Ness Avenue San Francisco

Standard Models
Prices F. O. B Factory.

Model "37 37 h. p		Model "54" 54 h. p	
Touring Car	$1875	Touring Car	$ 45
Phaeton	1875	Phaeton	245
Roadster	1875	Roadster	245
Limousine	3250	Limousine	375
Coupe	2350	Coupe	295

Buick

HOWARD AUTOMOBILE CO.
San Francisco

Prices F. O. B. Factory.

Models	Prices
24 Runabout	$950
25 Touring Car	1050
30 Roadster	1125
31 Touring Car	1285
40 Touring Car	1650

EMPIRE

OSEN-McFARLAND AUTO CO.
San Francisco and San Jose

Model—	Price
Empire 31	$1050

5-Passenger touring car, completely equipped.

LOZIER

BEKINS-SPEERS MOTOR CO.
Van Ness Avenue San Francisco

Type 72 Prices F. O. B. Factory Type 77

Model—	Price	Model—	Price
7-Pass. Touring	$5000	5-Pass. Touring	$3250
5-Pass. Touring	5000	2-Pass. Runab't	3250
4-Pass. Touring	5000	6-Pass. Limous'n	4450
4-Pass. Toy Ton.	5000	5-Pass Limous'n	4450
2-Pass. Runab't	5000	3-Pass. Coupe	3850
7-Pass. Limous'n	6500		

CASE

J. I. CASE T. M. CO., INC.
San Francisco.
Standard Models
Prices of Cars Completely Equipped F. O. B. Factory.

Model		H. P.	Price
5-Pass.	Touring	25	$1250
5-Pass.	Touring	35	1850
5-Pass.	Touring	40	2300

Ford THE UNIVERSAL CAR

PACIFIC KISSEL-KAR BRANCH
Van Ness and Golden Gate Aves., San Francisco
We Sell on Easy Terms
Standard Models
Prices F. O. B. Factory.

Model—	Price
Model "T" Touring Car	$600
Model "T" Runabout	525
Model "T" Town Car	800

Marion

MARION MOTOR CAR CO.
555 Golden Gate Avenue San Francisco
Prices F. O. B. Factory.

Model	H. P.	Price
37-A Touring	40	$1475
48-A Touring	48	1850
36-A Roadster	40	1425
38-A Roadster	40	1475

All Cars Completely Equipped.

Chalmers

PIONEER AUTOMOBILE CO.
1913 Models
Prices F. O. B. Factory.

Model "6," Thirty-six.		
Touring Car, 5-pass.	$2400	$1950
Touring Car, 7-Pass.	2600	2150
Torpedo, 4-Pass.	2400	1950
Roadster, 2-Pass.	2400	1950

All prices include full equipment and are f. o. b. Detroit.

HAYNES

HAYNES AUTO SALES CO.
Turk at Polk St.
Prices F. O. B. Pacific Coast.

Model 24—2, 4 and 5 Pass. (4-cyl.)	$1,950
Model 24—Coupe (4-cyl.)	2,400
Model 23—2, 4 and 5 Pass. (6-cyl.)	2,700
Model 23—6 Pass. (6-cyl.)	2,950
Model 23—Coupe (6-cyl.)	3,200
Model 23—Limousine (6-cyl.)	3,850

MARMON

MORRIS KENNEDY CO., INC.,
545 Golden Gate Ave. San Francisco
New Series Marmon "Thirty-Two"
Prices F. O. B. Factory.

Mod. Thirty-Two Chassis	$2500	Landaulet	$4100
Five-Pass. Touring Car	3000	Marmon "Six" 2, 4, 5 and 7-passenger	$5000
Four-Pass. Suburban	3000	Limousine	6280
Roadster	2900	Landaulet	6350
Speedster	2850	Berline Limousine	6450
Limousine	4000		

The Blessing of Your Motor Car

WHEN you loll in the tonneau of a modern touring car, with the purring motor transplanting you to your place of desire, swiftly, noiselessly—when the wind of the open country washes the ache out of your work-fagged brain, the while green things with their purplish-gray shadows swim past—when you, yourself, take the wheel a bit just for the sheer joy of feeling that trammeled power yield to your slightest wrist twitch; when you take your foot off the accelerator, throw out your clutch, press down on the foot brake and come to a gentle stop under a wide, cool tree, where *she* and the kiddies can open the hamper and spread a meal of cold fowl, and coffee, piping hot, out of the vacuum bottle; when you light your pipe and stretch your length on the grass, it is then that you sigh and offer up mute thanks for the blessing of the century—*your motor car.* —*Homer McKee in Cole Blue Book.*

——The Automobile Club of Southern California is having a reconnaissance made of a new roadway that will give direct access to motorists from east of the Sierras into the Yosemite National Park. At present there is no motor highway by which the tourist can reach Yosemite, except over one of the roadways that approach the park from the west, and this condition necessitates several hundred miles of extra travel upon the resident of Nevada or the Sierra country of California who wishes to visit Yosemite Valley.

With Models and Prices for the Convenience of the Buyer

MICHIGAN

MICHIGAN MOTOR CAR CO.
California Branch
283-291 Golden Gate Ave San Francisco
Imperial Garage—Oakland

Standard Models

Model—	Price
"L" and "O" .....33 h. p	$1690
"R" and "S" .....40 h. p.	1875

Overland

J. W. LEAVITT & CO.
301 Golden Gate Ave. San Francisco
Standard Models.

Model 79 Touring Car	$1075
Model 79 Roadster	$1075

f. o. b. San Francisco, with Electric Lights
With Electric Lights and Gray and Davis Starter, f. o. b. San Francisco $1250

REO

REO-PACIFIC COMPANY
Golden Gate Ave. San Francisco

Standard Models.

Model	H. P	Price
5-Passenger	30-35 h. p.	$1295
2-Passenger	30-35 h. p.	1295
1½ Ton Truck	30-35 h. p.	1975

Maxwell

UNITED MOTORS S. F. COMPANY.
Polk St., near McAllister San Francisco

Prices F. O. B. Factory.

Model 25, 5-Pass. Touring Car	
Model 35, 5-Pass. Touring Car	$1085
Model 40, 5-Pass. Touring Car	1550
Model 50, 7-Pass. Touring Car	2350

Pathfinder

PATHFINDER PACIFIC MOTOR SALES CO.
1219-1229 Van Ness Avenue

Standard Models

Prices F. O. B. Factory.

Five-Pass. touring car, 40 horsepower	$2185
Four-Pass. phaeton, 40 horsepower	2185
Two-Pass. Roadster, 40 horsepower	2160
Three-Pass. coach, 40 horsepower	2500
Two-Pass. cruiser, 40 horsepower	2000

STANLEY

STANLEY STEAM CAR CO.
441 Golden Gate Ave. San Francisco

Model	Price
2-Pass. 10 h. p.	$1350
2-Pass. 20 h. p.	1700
4-Pass. 10 h. p.	1450
4-Pass. 20 h. p.	1800
5-Pass. 20 h. p.	1800
7-Pass. 30 h. p.	2700
12-Pass. 30 h. p.	2500

MERCER

SIMPLEX-MERCER PAC. COAST AGENCY
1319 Van Ness Ave. San Francisco
Standard Models
Prices F. O. B. Factory.

Model	H. P.	Price
Type 35, Series G, 4-Pass.	32.4 h. p.	$3100
Type 35, Series H, 5-Pass.	32.4 h. p.	3100
Type 35, Series J, Race'b't	30.6 h. p	2850
Type 35, Series K, Runabout	30.6 h. p.	2850

Pierce-Arrow

PIERCE-ARROW SALES CO.
Geary and Polk Sts. San Francisco

Standard Models
Prices F. O. B. Factory.

Model	H. P		Price
38-C	38 h. p.	5-Pass. Touring	$4300
48-B	48 h. p	7-Pass. Touring	5000
66-A	66 h. p	7-Pass. Touring	6000

Velie

AUTO SALES CO.
418 Golden Gate Ave. San Francisco

Prices F. O. B. Factory.

"40" 5-Pass. Touring Car	$2000
"40" 4-Pass. Torpedo	2000
"40" Limousine	3000
M Special 5-Pass. Touring	1900
"32" Model B 5-Pass. Touring	1500
"32" Model W 5-Pass. Touring	1350
"32" Model RX Roadster	1450

National

HOWARD AUTOMOBILE CO.
523 Golden Gate Ave. San Francisco
Five Models, Improved Series V.
Prices F. O. B. Factory.

Semi-Racing Roadster	$2750
Speedway Roadster	3150
Toy Tonneau	3300
Five-Passenger Touring Car	3300
Seven-Passenger Touring Car	3400

Also Limousines, Sedans and Coupes.

Regal

FRANK O. RENSTROM CO.
F. O. B. San Francisco.
Van Ness and Golden Gate Aves., San Francisco

Standard Models.

Model "T" Underslung Touring Car	$1125
Model "N" Underslung Roadster	1075
Model "H" Underslung Touring Car	1525
Regal Underslung Colonial Coupe	1375
Model "C" Standard Touring Car	1375

WINTON SIX

THE WINTON MOTOR CAR CO.

S. E. Cor. Sutter and Van Ness

Prices F. O. B. Factory

Roadster	$	7-Pass. Touring	$
Toy Tonneau		Limousine	
5-Pass. Touring		Landaulet	
6-Pass. Torpedo		Coupe	

"Frisco" By-the-Sea

There is a poet in automobile row. Perhaps we had better say rhymster, judging by this particular paroxysm. Because this anonymous rhymster is well known, do we venture to publish the verse, rather than because we think it possessing true literary merit.—*Editor's Note.*

The poetic muse assails me,
At Carmel-by-the-Sea;
The home of elusive mussels,
And play-ground of the flea.

A town where shops are honest—
They do not lie or cheat;
But, oh, you festive flealets,
How you cling to one and eat!

"Mood" is a precious treasure,
And fish a common treat,
The pine-tanged air a pleasure—
But the flea is swift and fleet.

The barber here is a painter;
The plumber a writer of fame,
The man who brings our firewood,
To etchings signs his name.

It's me for San Francisco,
And good old "auto" row;
Where "smoke" fogs blow in the evening,
Where the bright lights gayly glow.

When I left that small sea village,
My heart beat gay and free.
With due respect to Carmel,
Give me "Frisco"-by-the-Sea.—Anon.

ANOTHER WORLD TOUR.

Mr. and Mrs. T. Frederick Lee, of New York City, accompanied by a Russian friend who is an accomplished linguist, are now on the European Continent, on the first part of an automobile trip which is to cover 80,000 miles, and which will be brought nearly to an end at the Panama-Pacific Exposition in 1915. They started August 1st from New York in a Buick, and their plan was to tour through Europe until September, and then to return to London and set out for India and the Far East. Mr. Lee has no chauffeur, and expects to take care of his own car throughout.

"LOOK OUT FOR THE COP!"

The Two Hundred Club, unique in the ranks of motoring bodies, has been formed by the Contest Committee of the Chicago Automobile Club. Any motorist who drives 200 miles in ten hours without a motor stop and conforms to the rules of the test, will be eligible to membership. Competition will be open to any motorist in the United States. As soon as twenty-five have qualified, a permanent organization will be effected.

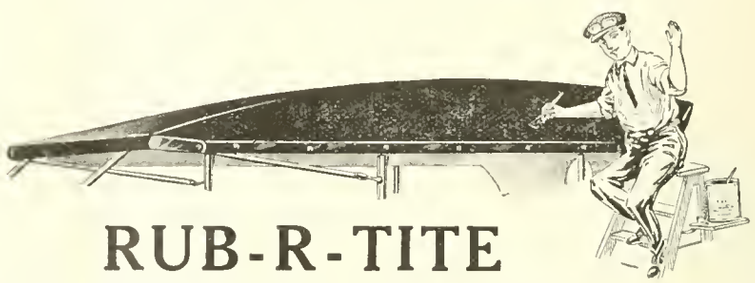
——Richard G. Badger and his brother Hard G. Badger of Boston, claim a new automobile record between New York city and Boston. They advise the National car manufacturers at Indianapolis that they made this run in a National roadster in elapsed time of six hours, fifteen minutes, their actual running time being only five hours and forty-five minutes. They claim to have made the run without one bit of tire trouble, and without any inconveniences at all.

RING SHOWS UP IN TUBE OF TIRE.

Last January J. W. Bradbury borrowed E. L. Campbell's automobile, and before he got off the main street was stopped by a tire blowout. He repaired the damage, but on reaching home discovered that he had lost a valuable ring. He employed boys to shovel the snow off the street, but the ring was not found, even when the snow melted, although a persistent search was made. A few days ago the tire blew out again, this time while Campbell was in the machine. In repairing it, Campbell felt something between the inner and outer casings, and found Bradbury's ring.

"This top looked shabby and leaked like a sieve—$50 was the price of a new one, but my neighbor told me how, a year ago, he made his top clean and waterproof as new—for ONLY a $5 bill. Now you see

I'M SAVING $45



RUB-R-TITE

RENEWS AND REWATERPROOFS

any worn and leaky top Leather or Imitation Leather.

RUB-R-TITE is a scientific laboratory product. Neither sun, storm or folding will cause it to peel, crack, blister or rot. If occasionally used (reduced) it prolongs the life and wearing qualities of any top indefinitely.

It is applied with a brush, easily and quickly. It dries quickly. It is economical—$1.50 to $5 renews a top (cost depends on size and kind of material.)

Every Can Guaranteed to Satisfy or Money Refunded

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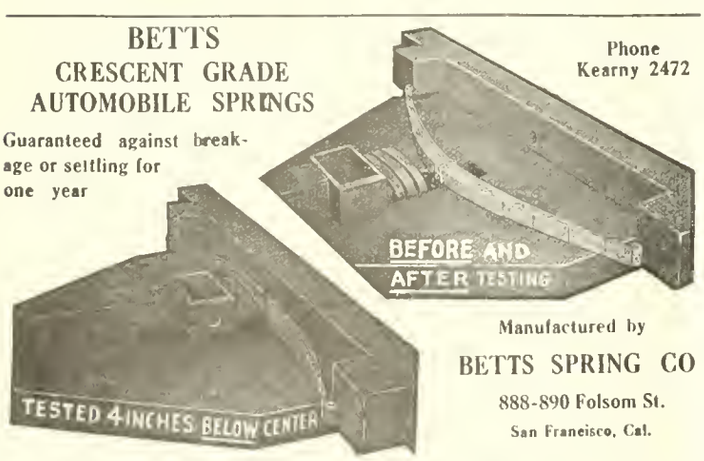

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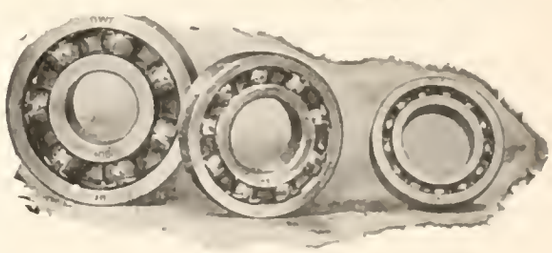

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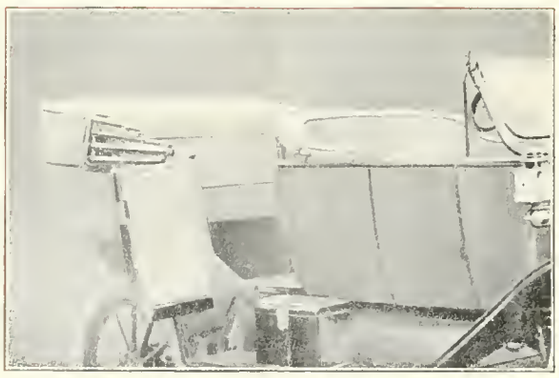

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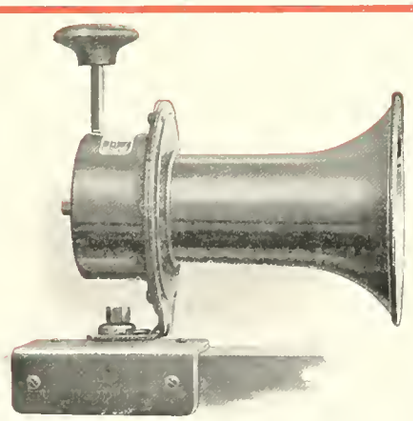

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Motoring Magazine, this issue contains some very interesting information concerning the road problems of the day. The question of good roads on the Pacific Coast is of vital importance. The betterment of Highways and the result attained from them is recognized as one of the greatest assets to a community.

From out the northwest from a story of how a school teacher has evolved a scheme by which the good road work may be increased by installing in the minds of school children the value of the betterment of the public channels of transportation. She is working for tomorrow and not for today.

The opening up of the connecting link of the road around Lake Tahoe has now made possible a most delightful week end tour as told in this issue.

From the far north comes a most interesting tale of the motor car and its advantages in supposedly snow bound Alaska. With its advent those of the last frontier see the passing of the "Malamute."

There is also to be found in the pages of this issue many new and interesting things for the motorist.

CONTENTS

NOVEMBER, 1913

Editorial 1
Tahoe Loop of the Lincoln Highway 3
Redwood Ring 6
Quaint Town of Upper Lake 7
The Marvelous Springs of California 7
The Gun and Auto 7
Connecting Dry Cells 7
Proper Way to Prime 7
From Out of the Northwest 8
Auto Show for Seattle 8
A Woman's Good Road Scheme 10
Turnbull Canyon Road 10
New Racing Track 11
Road Patrol 11
Of Interest to Motorists 12
Touring the Sierras 15
Good Roads Help Land Values 15
To Prevent Accidents 15
Women Motorists 15
Don't Drive in Rut 17
Just Missed a High Dive 17
Passing of the Malamute 18
Autos in Alaska 21
A Ten Year Tour 22
Troubles of Self-Starters 23
Lights Ordinance for New York 24

Vol. V November, 1913 No. 5

MOTORING MAGAZINE and MOTOR LIFE

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at the Office 21 Sutter Street, San Francisco, California

DEVOTED TO THE MOTORING INTERESTS OF THE PACIFIC COAST

MOTORING MAGAZINE
AND MOTOR LIFE

Tahoe Loop of the Lincoln Highway

By R. R. l'Hommedieu

The selection of the Auburn and Placerville roads as part of the Lincoln Highway by those who are responsible for the idea of a national transcontinental route was one of the wisest selections that could be made.

Coming direct across the sands of Nevada, the motorist who follows the Lincoln Highway will cross the Sierras and drop down into the fertile Sacramento Valley just as did the pioneers and argonauts of days of yore.

The real United States history of California is centered around this section. It is here where gold was discovered which carried with it all the romances of the days of '49.

These two routes, although quite well

Western end of Emerald Bay on new road.

Photos by Claude McGee.

Near Cisco on the Auburn road, Lincoln Highway. Photos by Claude McGee.

known by motorists, are not as popular as the grandeur of the scenery and the historic interest should demand. The main reason for this is that to make the Tahoe run without retracing one's course meant the taking of a loop through Nevada of a day's duration, or paying a heavy barge toll across the lake.

Late this fall, the California State authorities announced the completion of the State road from Tahoe Tavern to Tallac. This cuts out the trip through Nevada, and also the necessity of being towed across the Lake.

The connecting link will not only make the tour to the lake more popular, but also furnishes a drive that abounds in as beautiful scenery as can be found within the State of California.

With the opening of this road, man and woman can cross the Rubicon. This was supposed to be a pleasure after death, but from the heights of Rubicon Point one drops down truly into a land of promise.

Those who make this loop around the California section of the Lincoln Highway should, starting from Sacramento, take the Auburn Road. The road out of the capital is oiled and well kept, until one passes Roseville, the well kept road does not enter the railroad, but passes to the left of it, thence on past Rocklin to Auburn one finds a good macadam road —as one nears the latter place they find the road begins to wind in and out through the foothills.

Auburn can be considered to be the commencement of the climb up the Sierras.

In making the run from San Francisco, Auburn can be considered the stopping place for the night. To thoroughly enjoy the ride, an early start just after day-

On the road to Upper Lake in a Mitchell.

Summit of Rubicon Point, Lake Tahoe.

Photos by Claude McGee.

break should be made; from Auburn the route takes one past Colfax, Gold Run, Dutch Flat and Emigrant Gap, which by their names, stamps the existence of these towns as beginning in the days of the gold fever. It is around this section that some of the most interesting tales told by Bret Harte are laid.

From Auburn, on past Emigrant Gap to the summit, it is a steady climb; it is constantly going up, up over easy grades through wonderful and picturesque country which defies description of pen and ink, until the last hundred feet is reached, which is the heaviest grade to be encountered.

Over the summit of the divide, one drops sharply to the left for two hundred feet to the snow-sheds, going through snow shed number six. It would be well to mention here that those making the trip, in passing through the snow sheds, should send some one ahead to see that no trains are approaching. From Emigrant to the summit the snow sheds have to be crossed four times, and while it is easy to detect the approach of freight or passenger trains, yet it is impossible to hear the approach of returning locomotives which coast down the grade.

As one crosses snow shed number six to the other side, there bursts into view the grandest picture of the trip in the foreground, and to the left mounts jagged rocks without the slightest sign of vegetation. It is like the climax to earth's volcanic upheaval. Then as the eye turns to the right, it picks up the road, which drops down sharply through the jagged rocks for nearly a thousand feet to the green, fertile plateau in which nes-

James I. McMullen and a party of friends returning from a deer hunt in their Jeffery car.

tles the indescribable blue waters of Donner Lake. Those who have never seen Donner Lake from the crossing of snow shed number six have not seen the grandest picture to be witnessed in California. From the opening in snow shed number six there is a drop of about two hundred feet, which is the steepest on the Tahoe loop. It is for this reason it is by far preferable to go by way of Auburn and return by way of Placerville.

From snow shed number six on down past Donner Lake into Truckee, it is an easy ride. Turning at the mountain railroad town to the left, one takes the road to the right along the banks of the Truckee River to Tahoe City, where splendid accommodations to suit every one's purse can be had. From Auburn to Tahoe City is a nice day's drive.

From Tahoe City the old road leads around to McKinneys, along the shores of Lake Tahoe. It is from the latter point to Tallac that the connecting link of the State road has just been finished. It is, in keeping with all the State roads, well built and abounds in beautiful scenic effect; from the summit of Rubicon, one can look for miles over the lakes into Nevada, and over the eastern boundary of the State of California. It is in keeping with the grandeur of the whole country.

At Tallac one meets the Placerville road. From the lake side to the foot of Meyer's grade, one travels through meadow country; the grade at Meyer's station is short, but one appreciates that it is as hard a climb as there is to be found in the West. Once at the summit, it is a continuous drop down into Placerville, a distance of nearly fifty miles.

This fifty miles is replete with the history of the stirring scenes of the early gold days in California. It was along this road that gold was first discovered, and one sees on every hand the scarred earth, the result of placer and hydraulic mining; in fact, the now quiet and sedate town of Placerville was once the roaring hangtown of '49 and early '50.

From Placerville to Folsom one continues to see the marks of early days. It is this Placerville road which Mark Twain made famous in his story of the wild ride of Horace Greeley.

From Folsom to Sacramento is a boulevard; the 22 miles is in strong contrast to the twenty-five miles between Placerville and Folsom. It would be hard to find a worse piece of road than the latter, and if Mark Twain to-day were to ride over this section, he would imagine his Greeley story was a joy ride on a moonlight night.

Sacramento is the end of a good day's run from Tahoe City by the way of Tallac. From the capital it is merely up to the motorist how he wishes to return to San Francisco.

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Redwood Ring

It seems a shame that commercialism should have so ruthlessly cut its way through the Redwoods of California. One sees on every hand in touring the scars of the saw and axe. Those who would soften these scars have called the stumps the pulpit Redwoods, and in verse and prose have woven romance around the shoots coming from the roots that have developed into young trees, which they have called the Redwood ring.

A pulpit redwood on the road to San Anselmo. —*Photo by Arthur Spaulding Co.*

Enjoying one of the cool mountain springs which are to be found on practically every turn of the beautiful mountain roads of California. —*Photo by Arthur Spaulding Co.*

Quaint Town of Upper Lake

One of the quaintest towns in California is at the head of Clear Lake, and called Upper Lake; it might properly be called the Cross Roads. The highway from the south, east, west and north diverge to this point, making it a sort of headquarters for the motorist.

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The Marvelous Springs of California

The stranger within the State wonders and marvels at the harnessed electric power to be seen on every hand in the high powered wires that stretch all over the country. If these visitors were to tour throughout the mountains, they would appreciate why it is possible to collect this electric power. California is blessed with some of the best mountain streams in the world, and it is the force of these streams that generates this great electric power. In touring, one finds at every hand cool streams trickling down the mountain side. It is these streams, when combined, makes the mountain streams that generate the power.

The Gun and Auto

"The motor car is extending the pleasures of mankind every day. Ten years ago a deer hunting trip was an occasion that had to be planned weeks ahead. Accomodations had to be secured, letters written, hiring guides and making elaborate preparations," comments J. I. McMullen.

"To-day it is decidely different. This was brought to mind recently when a couple of friends proposed a trip to the country for deer. We left San Francisco on a noon-day boat, and by night we were in the hunting grounds.

"Up early the next morning, we were lucky enough to bring down a couple of bucks before ten o'clock. This was enough of the good eating, and before noon were on our way home, which we reached in good season, giving us plenty of time for a good night's rest. This meant a Saturday afternoon and Sunday away from the city and back to the desk in time Monday morning with a fine lot of venison in the larder. This would have been impossible before the day of the automobile.

Connecting Dry Cells

Dry cells should be arranged so that the zinc binding posts are all equi-distant, and where they will not come in contact with each other or any other metal. The bunch of cells should then be firmly tied together so that the connectors will not shake loose, and after screwing the binding post burrs down tightly, they should be fastened with a drop of solder. The best dry cells now have the zinc binding posts set in so that they are not likely to come in contact with each other or with other metal to short-circuit and run down the cell.

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Proper Way to Prime

There is a "best" way to prime your engine to make it start easily. The priming cups usually furnished on top of the cylinders hold just the right amount of priming fluid to do the work. If more than that amount is placed in the cylinder the mixture may be too rich, and the starting be difficult instead of easy. With stop-cocks closed, fill the cups with a priming fluid consisting of half gasoline and half ether, then open cocks and allow the fluid to run down into the cylinders.

From Out of the Northwest

Interesting Reports From One of Nature's Grandest Touring Ground in North America

Scenic Highway

The Alps should be called the "Cascades of Europe," is the belief of State Forester E. W. Ferris, of the State of Washington, who is enthusiastic over the scenic possibilities of Washington, and who is perhaps the most ambitious person in the State to see the commonwealth develop along this particular line. His home is in Skagit County, and he knows the mountains of Washington like a well-read book.

While he realizes that he is looking far into the future, he is already laying the foundations for an agitation in favor of a scenic highway that will loop the beauties of the mountains of western Washington.

Beginning with his home in Skagit, he proposes a trip over a well constructed highway up the Skagit River or its tributaries to the summit of the mountains, from where he would travel over the glacial areas that supply Lake Chelan with cold mountain water, down to that beautiful lake, and follow its borders sixty miles to where its blue waters tumble over rocky chasms five miles to the Columbia. Thence he would go down the Columbia to Wenatchee, thence across the mountain spur to North Yakima, thence westward through Natches Pass at the summit of the mountain again, on past Mt. Rainier, through Tacoma and Seattle, and along the shores of Puget Sound to his home in Skagit County.

Forester Ferris believes that every mile of this road is practicable.

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Clatsop County New Roads

In answer to the numerous inquiries as to how Clatsop County, Oregon, would expend the $400,000, provided the proposed bond issue for that amount is passed by the people at the coming election, County Judge Judd, of Clatsop County, made the following statement, which shows that the money will be turned over to the State Highway Commission by the County Court to be expended on three trunk highways in the county under the direct supervision of the State Highway Commission. He says:

"Believing that the trend of events points to the early passage of laws in this State, and also of the United States, for the building up of a great system of National and State highways; and, believing that the only proper head to handle the development of this great work is that of the State Highway Commission, it will be the policy of the County Court of Clatsop County to place any funds derived from the sale of bonds under the direct supervision of the said State Highway Commission.

"We will insist upon the surveying being made by the Highway Engineer, and that all data necessary for the proper letting of contracts be furnished from the office of the State Highway Commission, will submit the bids to the Commission before accepting the same, and will appoint some person recommended by said State Highway Commission as county road master to superintend the improvements thus made—believing that this is the proper method to procure the best results from money expended in road building. We are very sure that all locations of these three main highways will be made with a view to serve the most people—our own people first—and where existing roads are not located, which will meet with the approval of the general public.

"These three highways, as described in the election notices, will pass through practically every settled part of Clatsop County, and will be of equal service to all of the people in the county. It was the object, in naming these three routes, to serve the best interests of all the residents of the county, and it is the opinion of the court that this work should be done under the supervision as above stated, thereby making these three highways intercounty roads; that is, roads which will connect with the adjoining counties.

"Road No. 1 will connect with Columbia County, along the Columbia River. Road 2 will connect with the south end of Columbia County and Washington County, making the most direct route to the Willamette Valley. Road No. 3 will connect the city of Astoria with the main thoroughfare in Tillamook County. At a day not far distant, these will be a link in the great highway which will be built along the coast in the State of Oregon.

"There is no question but that at the next session of the Legislature large sums of money will be appropriated for the improvement of State highways or highways that are built by counties, under the supervision of the State Highway Commission; and it is very necessary that Clatsop County should be in a position to receive her proportion of these funds. Without a system of highways built under the supervision of the State Highway Commission, we will have no State highways—consequently will receive no State aid."

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Auto Show for Seattle

Automobile Convention Contemplated by Enthusiastic Dealers

The announcement that Seattle is to have an automobile show again this year should have much to do with influencing the manufacturers who are contemplating holding an automobile educational convention in the Northwest during the coming winter to select this city.

As announced, the automobile show this year, which will be the second annual affair, will be held from February 9th to 14th, both dates inclusive.

Last year Seattle gave the most creditable automobile show that has ever been held in the Northwest. This year it promises to be even still better. No more suitable time could be selected for the automobile educational convention than that of the week of the show, and the two being held in conjunction should draw an attendance of thousands to this city.

William I. Fitzgerald, who will promote the show this year, states that he

would be glad to have the automobile educational convention held during show week; that he would erect a lecture platform and give the delegates the use of the building free. He will make this offer to the various automobile factories in the East.

"If such a proposition goes through as planned and discussed, it should be a great boon for the automobile in Seattle. It should not only prove of interest to the dealers, but should attract motorists from all over the Northwest.

The purpose of the convention would not interfere in any way with the show—rather, one would help the other. As contemplated, the various automobile and automobile accessory factories would send a nationally recognized expert to this city to deliver lectures upon the subject with which they are the best acquainted. Their object would not be so much to boost any one car or product as to impart general information of interest to motorists for the advancement of the cause as a whole.

Not only should such a convention prove valuable to the owner, but to the lecturers themselves. Conditions in the Northwest, and particularly Seattle, are so different from most places that it has been suggested that a day be set aside for the owners to tell these experts their opinions and ideas of needed improvements and innovations here.

Seattle is the logical city for such a convention, as it is situated midway between Portland and Vancouver, and the average mileage from points in the States of Washington, Montana, Idaho, Oregon and British Columbia, is less than to any other city in the Northwest that could accommodate such large crowds as would doubtless attend.

Local motorists and dealers, quick to see the advantages that would result from such a convention, intend to co-operate in an effort to secure this convention.

Fitzgerald announces that he has already had requests for spaces from sixteen firms for the automobile show, and it is probable that some late bidders may be unable to secure space. The Armory only accommodates thirty-six spaces, each space permitting of three cars. In order that the show may be a representative one, not more than two spaces will be allotted to any one exhibitor.

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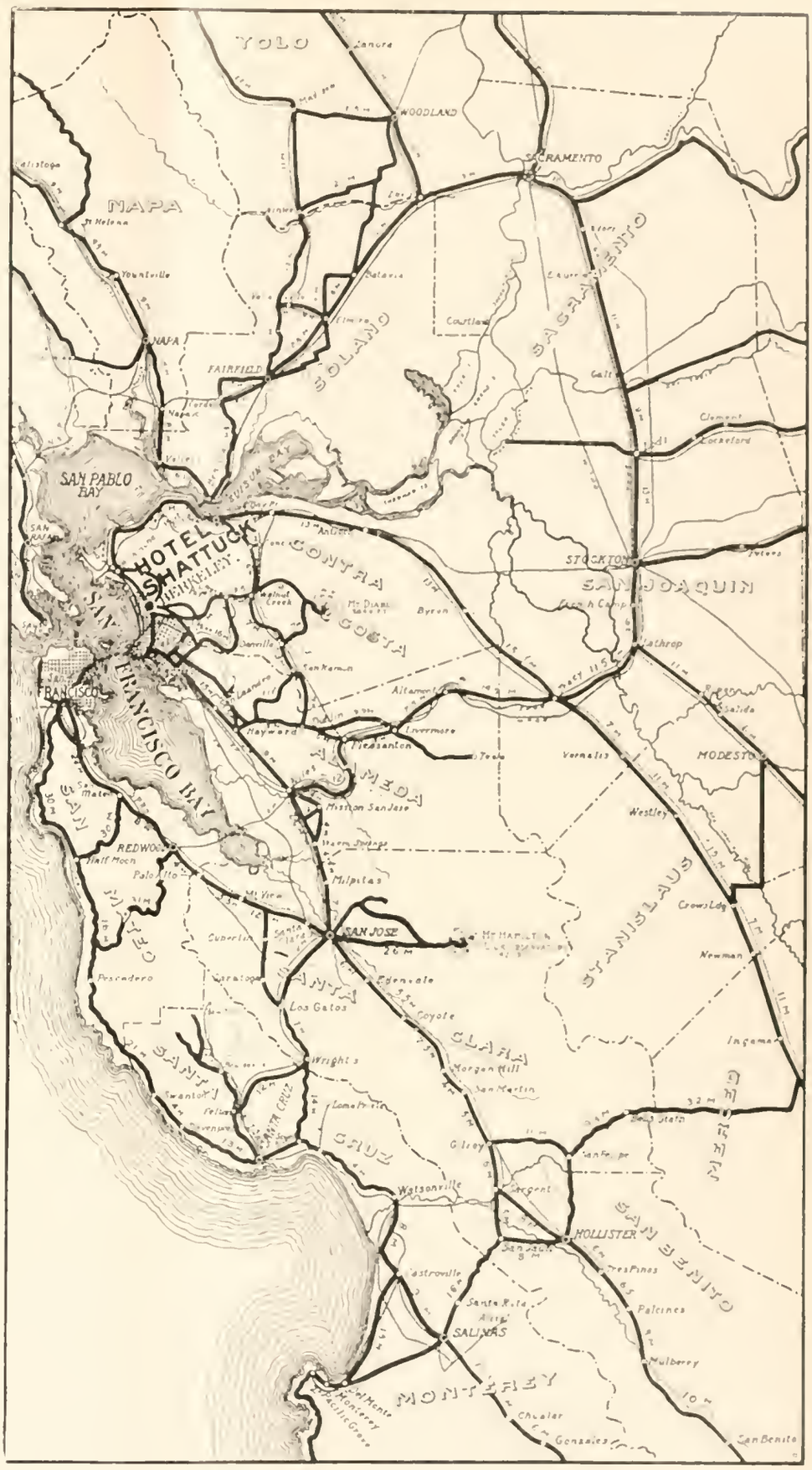
Shabby Top Looks Bad

A dilapidated top gives a bad name to an otherwise good car. Remove the old, shabby top, shine up the brass, polish the varnished surfaces, remove all grease accumulations, and the old car will look quite smart.



Courtesy Britton & Rey, Lithographers.

One of the most complete motoring maps that has ever been issued is given in this number of Motoring Magazine. It covers that section of California from Del Monte on the south to Woodland on the north, Calistoga on the west and Modesto on the east. The great value of the map is that the distances between points are distinctly marked. It is a complete bay map.

A Woman's Good Road Scheme

An Intellectual Solution of Better Highway Building Comes From Oregon

Road building, a course of study for the rural schools of Lane County, Oregon, is to be introduced within a few days by Miss Goldie Van Biber, School Supervisor in the Siuslaw district. Instructions have been mailed. This is the first experiment of its kind ever tried in Oregon. Actual road building is the laboratory work which will accompany this course. The children of each district will build and maintain during the approaching rainy season a strip of county road near the school building. The school whose road stands the winter and is found in the best condition will be the winner of a unique contest in which school children on the Siuslaw eagerly are awaiting to participate.

County Judge Helmus W. Thompson, Lane County's most active good roads enthusiast, was so pleased with this woman's plan to teach the fundamentals of road building in the rural schools that he immediately offered two huge silver cups as prizes for this good roads contest.

"I was afraid that perhaps the county court might not allow me to experiment on the roads, but it has even authorized its supervisors to furnish us rock and gravel, handle powder and do the work that children could not do alone," says Miss Van Biber, who has just made a 60-mile stage trip to present her plans.

The county court sees in the scheme of this small woman a plan to establish the fundamentals of good road-building in a new generation and at the same time to interest the present farming class in the principles of drainage and highway construction which the children learn at school. It has entered into the plan with enthusiasm.

"It's a corking idea," exclaimed Judge Thompson, while telling of Miss Van Biber's plan. "It is a remarkable woman who will design a scheme like that. It will accomplish results that we have been longing for. It has taken that girl, a Supervisor over thirty-five districts in a mountainous seacoast district, without a railroad, to solve our good roads problem. Some of these school people go around with a mouthful of teeth, thinking of nothing at all, but that girl has a head on her shoulders. This is all her scheme, too.

"This is the attitude in which the County Court received the plan which this girl Supervisor, scarcely out of college, brought timidly before that body recently, asking only the use of 100 yards of road in each school district.

"Miss Van Biber has jurisdiction over 700 square miles, extending into Lincoln, Lane and Douglas counties. She is the idol of her district. All the year on horseback, by boat or on foot, she travels over the rough mountain highways and trails up the small rivers. Every homesteader is her friend; wherever she appears she is welcomed. It was she who introduced manual training in the Siuslaw schools, and the exhibits of handicraft, sewing, carpentry work, bead work from Florence, took first prizes at the Lane County fair ahead of the Eugene and advanced valley schools. She herself supervised the installation of the industrial work, placed it under proper supervision, and now roadbuilding is her next step.

"She is a modest little woman, and was a student at the University only three years ago. When the County Judge suggested that her plan be made known in the newspapers, she protested; when the reporter interviewed her she protested. She pleaded that her name be left out.

" 'It's the plan that's important; that's all,' said Miss Van Biber. 'Don't mention me. And besides, it's only an untried plan. Yet I know it will succeed, because the people there are interested; they want it tried, and they have never attempted anything down there that did not succeed.

"Those mountain people in the Siuslaw territory are an unusual class. They have lived in that secluded region for years and years. They never had a school fair until two years ago; now they can hold the biggest and best school fair in Lane County. Whatever they take up they put through.

"And moreover, this is no scheme to work children on the roads. They will care for only one hundred yards, and not necessarily that much if the district road be difficult.

"The road building is not going to be taught by the teachers, because the average teacher is not qualified to teach road building. We shall organize a good roads club in each school. We shall give schools credit for the hour or more a week that they spend on the roads. Those who undertake this road work, and it will be purely optional, will be excused from studying the road chapter in the Agricultural Manual. The whole plan is to arouse interest in roads, and give adequate instruction, and the already overworked teachers will not be burdened with this additional work.

"Of course, all districts will not be able to participate, because many of the schools are built on trails; they have no roads on which to work. Possibly these districts can compete for the prize by laying out and actually building a piece of road past their school.

"In the Siuslaw County we will work out this plan under the most difficult conditions. Everything is against it. The grades are narrow, scarcely more than trails, and the enormous rainfall is the most severe test a road can have. The Siuslaw roads are subject to more washing than any other roads in the country."

Turnbull Canyon Road

Connecting Link Started In Southern California

Actual work on the Turnbull Canyon road has been started. Colonel Scofield, president of the Board of Trade of Whittier, was accorded the honor of holding the plow handles for the first furrow. Grouped around him were the officers and directors of the two big boosting organizations of the city, the Board of Trade and the Whittier Commercial Club. Seated on the plow-beam was Dr. George Flanders, dubbed by his fellow boosters as the "Daddy of Turnbull Canyon Road."

"Colonel Schofield made a short address, in which he called for three cheers for Supervisor Manning and his associates for the new road, and for Dr. Flan-

ders and his many able assistants. These were given with a vim. Mr. Scofield said:

"Gentlemen, we have just started a work which will prove an epoch in the history of Whittier. With the completion of this short piece of road, many new things will come to Whittier. We are going to open our city to the automobile travel of Southern California. We are opening the way for something which will call for vast improvements within our city. Paved streets must follow the great influx of travel which will be invited here by this beautiful canyon road. Let's all get behind the Supervisors, who have made this work possible, and follow the work right through the canyon. Let us stay behind the men who are cutting out the road, and the men who are boosting it, and we will experience a greater growth within the next few years in Whittier than has been our lot during the past twenty-five."

Dr. Flanders was congratulated for his persistent efforts in behalf of the road, and in his modest reply he transferred the credit to others, and incidentally coined the phrase, "The Panama of the Puente Hills." This struck a popular note, and three cheers were given for Whittier's canal through the hills.

The new road will be 16 feet wide, with a right-of-way 50 feet in width. It will be made in the same manner as are all of the county roads. The cost has been estimated at $20,000, but it is doubtful if this covers the entire expense. The Supervisors have agreed to expend at least $10,000 on the road this year, and that means work for every man and team available. The Turnbull Canyon road will present a busy scene for the next year.

New Racing Track

Fine Motor Speedway To Be Constructed At Seattle

Contracts for the construction of the $100,000 two-mile automobile racing course to be built by the Seattle Motor Speedway Corporation near Renton Junction, eleven miles south of this city, were awarded recently. Grading is to begin within the next two weeks, and the track will be in readiness in ample time for the holding of the first big speed meeting on July 14th and 15th, when the pick of the world's fastest cars and premier pilots will clash for prizes amounting to $30,000. This represents the richest purse offered on any track with the exception of the brick speedway in Indianapolis.

The topography of the 160-acre tract upon which the racing course is to be built is such that grading will be an easy task, and can be done without heavy expense. The ground will be plowed up and rolled, and then permitted to settle during the winter months. In the spring it will be packed down thoroughly by a fleet of heavy steam rollers, after which will be applied a surfacing of asphaltic oil solution that will provide a smooth, hard track capable of withstanding the terrific pounding of the powerful steel monsters.

The grand-stands and boxes, with a combined seating capacity for 34,000 persons, and the pagoda for the judges, officials and press, will be ready at least a month before the date of the races. Space for additional stands will be reserved in the event that the predicted attendance of between 75,000 and 100,000 persons is realized.

Directly across from the grand-stands and on the inside of the course at the turns there will be reserved parking space for 2,500 automobiles, while on the back stretch free room for upward of 8,000 automobiles is available. This space will conveniently take care of the huge fleet of motor cars that is expected to bring thousands of speed enthusiasts from all parts of the Northwest and Pacific Coast. Numerous approaches have been provided to obviate any congestion of traffic.

Engineers have been working for months on the plans for the track to make it not only the swiftest racing course in the world, but the safest. The best features of the famous ovals at Indianapolis and at Brooklands, England, are to be incorporated in the Seattle project. The straightaways will be three-quarters of a mile long, while the curves, wide, highly-banked and scientifically constructed, will reach a quarter of a mile. Speed of from 100 to 110 miles an hour will be possible on the turns, say the engineers, and it is hoped to dedicate it to the speed realm to the accompaniment of a world's record or two.

An elaborate electric lighting system is to be installed, which will make possible the holding of twenty-four hour automobile races and night speed events.

The Seattle motor speedway is ideally situated, for it covers 160 acres of practically level ground in the Black River Valley, and is reached by two trunk roads the Pacific Highway and the Sunset Highway—four transcontinental railroads and an electric interurban system, offering unexcelled advantages for handling the enormous crowds that are expected to witness the thrilling battle of cylinders."

Road Patrol

Pacific County Determined to Keep Up Its Highways

Pacific County, in the extreme southwestern part of the State of Washington, has recently inaugurated a system of road patrol under the supervision of the County Engineer's office, which covers 173 miles of highway, and is using 65 men. The implements used are a King drag and a ditch cleaner, in addition to pick and shovel. This system was put in force under the immediate supervision of S. P. Davis, who has devoted several years to the study of the King drag and its operation. The average cost per mile is fifteen to seventeen dollars.

The duties of these patrolmen are to keep ruts filled, ditches and cross-roads cleaned out, cut away obnoxious weeds and do any ordinary work that can be accomplished by one man to good advantage. The added advantage of this is that the patrolman becomes responsible for his section of road, and any other repairs that are needed which require a bigger crew are immediately reported to the Supervisors in charge of the district, and the work is done when it is most needed, which results in a saving of more than enough to pay for the work of the patrolmen.

It is easy to see that it is to the interest of each patrolman to have big repairs made at once, instead of letting the road go on until it is impassable.

Pacific County has the honor of being the first section to put in this system of road patrols on anything like a definite working basis. Other sections have attempted spasmodic efforts to gain the same results, but no regular line of action has been planned or carried out.

——A small leak in a gasoline feed pipe may not be noticed, especially in summer, when the gasoline evaporates quite rapidly. This may not only be the reason for small mileage per gallon of fuel used, but it may be a dangerous source of fire.

Of Interest to Motorists

Gathered Thoughts of Man Who Has Been There Before

FOR TOWING WRECKS.

Holmes Towing Device.

A handy little device for towing, where the wheels have received damage in collisions or otherwise, is being made by Robert Holmes. This is an appliance under the rear or front axle of an automobile to tow in crippled cars. These trucks have two cast-iron wheels three inches in width, twelve inches high and equipped with hyatt roller bearings. By using this on either the front or rear wheels, a car can be towed in at full speed.

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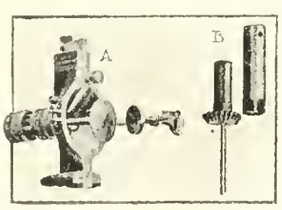
A NEW VALVE TOOL.

A New York company is marketing a tool for dressing and reseating valve seats without grinding. It is called the B. B. Valve Tool, and consists of a valve dresser which is so constructed that it will dress valves of any size of material at a perfect angle at forty-five degrees, and a reseating tool which reseats the valve seat quickly and accurately at a



G. B. Valve Tool.

perfect angle to meet the exact angle of the valve. This tool not only removes all carbon deposit, but will also dress off all imperfections on valve or seat, such as ridges, grooves, pits, etc. This tool is drop-forged, case-hardened steel, and the blade and seat cutter, high speed, oil-tempered tool steel.

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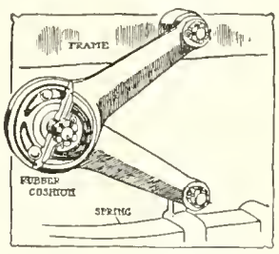
NEW SHOCK ABSORBER.

A new shock absorber has been put on the market. This new absorber is of unusual and interesting construction. Instead of dampening the vibration of the car, caused by road inequalities by some sort of friction device, the force of the shock is absorbed by rubber cushions. This device consists of three balls, which run in tapering runaways, three in each arm of the shock absorber, these arms being forced together by two rubber cushions, the whole held in place by a bolt and castle nut. When the body springs are compressed, the balls run up into the ends of the race, and force the two arms apart, thereby compressing the rubber



Rubber Disc Absorber.

cushion. The greater the spring movement, the more the rubber discs are compressed and the more resistance they offer. Adjustment is obtained by screwing down the castle nut, being adjusted more tightly for use on heavier types of vehicles. Information concerning the shock absorber can be had at the office of the News Letter.

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HUB ODOMETER.

The Stewart-Warner Speedometer factory of Chicago have added to their line a hub odometer which is said to fit any make of truck or electric car. It is a Stewart Odometer, such as used in the Stewart Speedometers, enclosed in a cylindrical casing with the dial on a flat face. It registers up to one hundred

Stewart Odometer.

thousand miles, the numbers being black on a background of white, except the tenths of a mile, which are red figures.

The drive is positive, consisting of pinions with worm and spiral gears, each pinion being made from a single piece of steel hardened and heat treated to resist wear.

Through an ingenious application of the "Geneva stop" mechanism, the dials are locked except at the instant of registering. Only those which are to be moved are then unlocked. There are no springs, pawls or ratchets in the entire mechanism.

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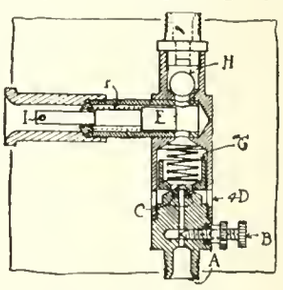
EXTRA JET FOR EASY STARTING.

An extra jet for easy starting purposes, which can be installed by any automobilist, has just been brought out. This device can be placed on any carburetor, and when starting the motor it furnishes a rich carburetor mixture directly to the upper part of the intake manifold. It carries the gasoline from the bottom part of the float chamber to the manifold through an independent lead, and is carbureted on its way to the motor by a device in the line. After mixing with the gasoline, the mixture goes straight up by check valve and out the top through the copper tubing to the manifold at the highest possible point. The name extra jet describes this device very closely. It is impossible to leak because the gasoline is drawn up to the opening by suction,



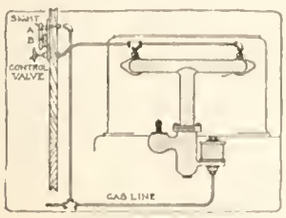
Extra Starting Jet.

and instead of putting simply raw gasoline into the intake pipe, it delivers a vaporized mixture, which will ignite easily. It is used only at the time of starting, and does not affect the carburetor in any way. The method of operation is as follows: Through the dash handle to open position when it will lock, then with the throttle closed, crank the motor; it will in most cases start on the third or fourth pull if the spark is good; then, unless the weather is cold, release the dash handle, which will spring closed. If the engine starts, and after running a few revolutions stops, it means that the jet is giving too much gasoline, and the needle

valve should be slightly closed. After the engine has stopped from too much gasoline, throw off the extra jet and open the throttle slightly; the engine will then start on the first or second pull. Information concerning this jet may be had at the office of the News Letter.

NEW PRIMER IMPROVED.

The Webb Jay primer, brought out some time ago, has been greatly improved. This new primer incorporates a sight feed whereby the driver is able to see just how much gasoline if any is sent

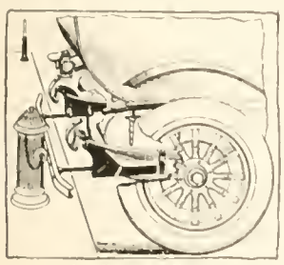


The Webb Jay Primer.

to the cylinders to gain a start. There are two pipes within the sight, the upper one connecting with the pipe which caps the gas line, and the lower one which runs to the intake manifold of the motor.

A "DIFFERENT" BUMPER.

M. J. LeClerc has a rear bumper that differs from the conventional type, as it can be attached without drilling the frame, removing shackle bolts or disturbing the construction of the car. Flat

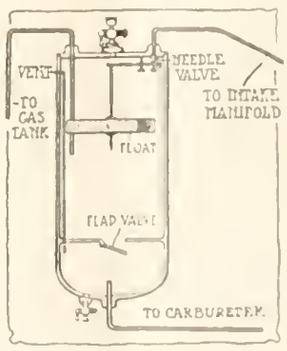


LeClerc Bumper.

plates, which are clamped to the spring members hold the guides in which the bumper rods slide; these are fastened to the channel steel bumper by screwing into riveted cast-iron brackets. Adjustment is provided both as to height of bumper and angularity of same with the ground so that it can be easily and satisfactorily adjusted to any car.

GRAVITY GASOLINE FEED.

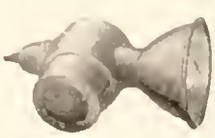
Webb Jay has brought out a system which changes pressure to gravity gasoline feed. This system does away with hand and power pumps, and leaves the gasoline tank in the rear. This device is a brass can ten inches high and five inches in diameter, fitted with three copper pipe connections, one coming from the gasoline tank and one runnig to the intake manifold and third to carburetor. When in operation the suction of the pistons creates a partial vacuum in the container, because the piston suction acts through the pipe leading from the intake manifold to the container. Inserted in



the container is a flat valve in order to prevent the piston suction affecting the carburetor. As soon as this suction takes place, the valve closes, forming two compartments in the container. As the level of gasoline arises in the container, the float rises, and when the container is full the needle valve will shut off the pipe from the intake manifold, thus stopping the suction. Owing to the weight of gasoline, the flat valve will now open, and this gasoline will drop to the lower chamber and thence to the carburetor. Water or dirt that accumulates in the fuel will drop to the bottom of the chamber and may be drained periodically.

MAGNETIC TROUBLE LAMP.

An electro magnet in the circuit with the trouble lamp for more convenient use has just been brought out. This causes the lamp to stick to any iron or steel part of the car and make it possible to get light in all inaccessable places; for engine repairing it can be placed on available surface of the cylinders or frame, or on the axle, frame or flywheel in working underneath the car, fender or wheel hub in changing tires. It weighs only thirteen ounces, and exerts a pull of as many pounds, so there is no danger of shaking it off. In the absence of the usual long handle this lamp is smaller than the ordinary trouble lamp. The silver plated reflector is two and a half inches in diameter, while the sticking face with one pull of the magnet in the center is one and five-eighth inches across. The case, which also is used as the handle, is made of aluminum, and four candle-power lamps of any voltage common in electric starting and lighting systems are provided.



Magnetic Trouble Lamp.

NEW TIRE FOR MOTOR TRUCKS.

A new cushion tire especially adapted for motor truck operation has just been produced by the Motz Tire and Rubber Company, of Akron, Ohio. Heretofore, the company has manufactured cushion tires exclusively for passenger vehicles and delivery wagons, and a solid tire of conventional form being made for the heavier commercial cars. This new tire in design follows the construction of the passenger car type closely, it having the characteristic under cut side and dual tread, which features give it its cushion-

New Motz Tire.

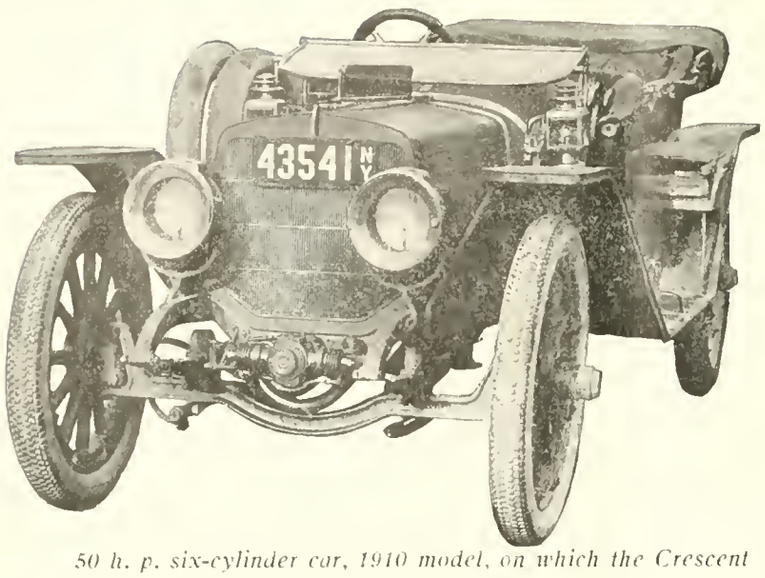
ing effect. It is flatter in cross-section, and the non-skid feature is obtained by perpendicular indentations on the inside of each tread instead of by diagonal grooves across their faces. These tires are made in sizes up to four inches, and according to S. A. E. specifications, it is guaranteed for ten thousand miles, and against effected material and workmanship for one year.

FOR A TRAILER.

An apparatus for attaching trailing vehicles to automobiles, invented by an 18-year-old boy in California, has proved successful in practical tests. This apparatus is simple, consisting of a steel fork, a double-acting spring buffer, and a draw-bar with an oscillating joint. One end of the device is attached to the rear axle of the automobile by collar bolts, which can be detached in less than two minutes, while similar collar joints fasten the fork at the other end to the front end of the trailer. The whole device is so flexible that the trailer follows the automobile easily around the sharpest turns. At present this device is used only for hauling picnic parties, but it appears to be adapted as well to the heavier duty of attaching trailers to motor trucks.

LUNCHEON OUTFIT.

A luncheon outfit is shown on the market, which is almost a complete dining room, packs into a box small enough to fit snugly on the running board of an automobile. Glass, cutlery, crockery, table and chairs for six persons, are included in the set, and there is ample space for food and drink.



50 h. p. six-cylinder car, 1910 model, on which the Crescent has given satisfactory service for two years.

THE CRESCENT SYSTEM.

The Crescent System makes every car self-starting. It is no longer necessary for you to sell your old car and buy a new one, in order to have a motor that will start from the seat. You probably have now just the car you want. To sell it and buy a new one, just to set a self-starter, would mean a big loss—hundreds or perhaps even thousands of dollars—and with no real improvement except in that one item of a self-starting motor.

Without making any other change in your present car, you can make it self-starting by simply equipping it with the Crescent system—a miniature power plant that creates and stores enough high pressure air to start any make of car under any conditions.

This power is exerted directly on the crank shaft of the motor—just like hand-cranking, only twenty times more powerful. The tank, which carries power for 40 or 50 starts, is replenished at will in a few minutes—simply by pressing a button while the car is in motion.

No question about its efficiency. In the past fifteen months it has been installed on over 67 different makes of cars, and not a single instance has been reported where it has failed to work with entire satisfaction.

This system is guaranteed to hold the air absolutely and indefinitely. This has been accomplished by fittings of special design, and without the use of a shut-off or "night" valve.

It enables a lady to handle and drive the largest gasoline cars with all the convenience of an electric.

It not only cranks the motor, but furnishes power for inflating tires, cleaning and dusting the car and clothes, operating a signal and other important duties.

Each outfit is complete, including all material necessary. It can be readily installed by any good repair shop. It is fully guaranteed for twelve months. We invite you to call on any of our dealers

On December 1st, an outfit especially designed for Ford car, and adaptable to any of the other small cars, will be ready.

The Crescent Co., Inc., is located at 1199 Woodward avenue, Detroit, Mich. Bernard I. Bill, of 543 Golden Gate avenue, is the Pacific Coast distributer for this novel device.

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TAIL LIGHT TO COMPLY WITH THE LAW.

There has just been brought out a rear light and registration number to meet the requirements of the State law for rear numbers that can be read. The figures on the number plate stand out with such distinctness and so effectually illuminated at night that they are perfectly legible and intelligible at a greater distance than is required by the most exacting State law. It is one of the first practical solutions of the illuminated number problem in accordance with scientific lighting principles, as well as embodying therein the graceful outlines which are naturally associated with the automobile. Instead of keeping the appearance of the car ugly, as is commonly the case, they add a note of elegance, making the combined lamp and number especially attractive when illuminated at night. The Stafford Lamp is handled by Chanslor & Lyon Company of this city.

A New Tail Light.

NEW WARNING BELL POPULAR.

The Liberty Bell, a new automobile warning accessory, has made a most favorable impression among the automobile owners in San Francisco. It is distinctly different than anything of its kind heretofore used. Although thoroughly ornamental in design, yet it is at the same time one of the few warning signals that has received throughout the country recognition by traffic officials. Bull-dogs, elk heads, tigers, doctor's or hospital crosses and eagles are mounted on the bell, which is placed on the radiator cap, adding to the beauty of the car.

Liberty Bell.

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CLEAN YOUR SPARK PLUG.

It is very seldom that the points of a spark plug need cleaning, but grease and mineral dirt will accumulate both on the outside and on the inside of the porcelain in such a manner that the current will pass without jumping the gap where ignition occurs. These are the parts that should be kept clean if you wish efficient service. A porcelain cover for the spark plug is an improvement not yet in general use.

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AN AUTOMOBILE BED.

A piece of heavy canvas, four feet and nine inches by six feet and six inches, having a wide hem all around and the corners cut off six inches in, with one and one-fourth inch galvanized iron gas pipe in each side hem, and elbows at each corner for one-inch cross spreaders to slip in when wanted for use, makes a good bed. It is to be placed on the backs of the seats, between the top-bows, extending partly over the front seats.

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EXHAUSTION OF DRY CELLS.

When dry cells are used for starting purposes only, they should give almost an entire season's use. When they rapidly run down it means that there is a short-circuit leak somewhere, or that you have forgotten to throw off the switch when the engine starts. A small two-point switch placed in a very conspicuous place close at hand, arranged to open the battery circuit close to the battery, will often remedy the matter.

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——Gear case grease should not be too stiff. It should be able to flow between the teeth of the gears freely, and a small amount of graphite will be an improvement.

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——Ordinary mud, when allowed to dry on, will dim the luster of the best varnish. Rinse it off with a gentle flow before it becomes dry.

A. D. Plughoff in the high Sierras in his Overland.

Touring the Sierras

"It is only until recently that the motorists have appreciated touring in the high Sierras," says A. D. Plughoff. "The great improvement in power and construction in the motor car has made it possible for others than experts to attempt to negotiate the steep grades of the high mountains. The improvement of mountain roads by the State has also opened up many new sections to touring. By the opening of the Fair, it will be possible to drive anywhere in the high Sierras."

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Good Roads Help Land Values

The following from Bradstreets, contains another argument for good roads:

"According to the data gathered by the Department of Agriculture, where good roads replace the bad ones the values of farm lands bordering on the roads increase to such an extent that the cost of road improvement is equaled, if not exceeded. The general land values, as well as farm values, show marked advances following the improvement of roads. As the roads in no way affect soil fertility or quality of the farm, advances are asserted to be due essentially to the decrease in the cost of hauling products to market or shipping point.

Farms are now regarded as plants for conducting the business of farming, and any reduction in their profits through unnecessary heavy costs for hauling on bad roads naturally reduces their capitalization into values. With reduced costs for hauling, profits are increased, with the result that the farm plant shows satisfactory earnings on a higher capital value. Immigration is particularly marked where road conditions are favorable; in fact, the figures of the department seem to indicate that good roads indirectly increase the demand for rural property, and the price of farm land, like that of any other commodity, is ruled by the relations between supply and demand.

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To Prevent Accidents

While actual statistics show that only one and one-half per cent of automobile accidents occur at railway crossings, nevertheless this one and one-half per cent is so large that automobile associations are co-operating with the railroads to minimize the number, and bring about a greater exercise of care on the part of pedestrians and drivers of motor vehicles.

In making an effort to ascertain where the responsibility for crossing accidents might rest, some observations were recently made by one of the railroads with offices in San Francisco, and the statement of the results, involving 16,522 motor vehicles, 4,246 teams, and 4,526 pedestrians, shows that 69 per cent of the drivers of motor vehicles took no precautions whatever to prevent being struck at crossings, 21 per cent passing at a high rate of speed.

It is pointed out by railway officials that the millions necessary for added grade protection would levy extra toll on the rates paid by shippers and passengers. There would be less necessity for this if more precautions were taken by pedestrians and drivers at the crossings.

The observations were made in San Francisco, Lodi, Sacramento, Stockton and Oakland. The total of the pedestrians and drivers of teams and motor driven vehicles who crossed tracks during the period of observation was 25,290. Of this number, 35 stopped and looked in both directions before crossing; 8,950 kept moving and looked in both directions; 1,694 kept moving and looked in one way only, and 14,617 kept moving and looked straight ahead.

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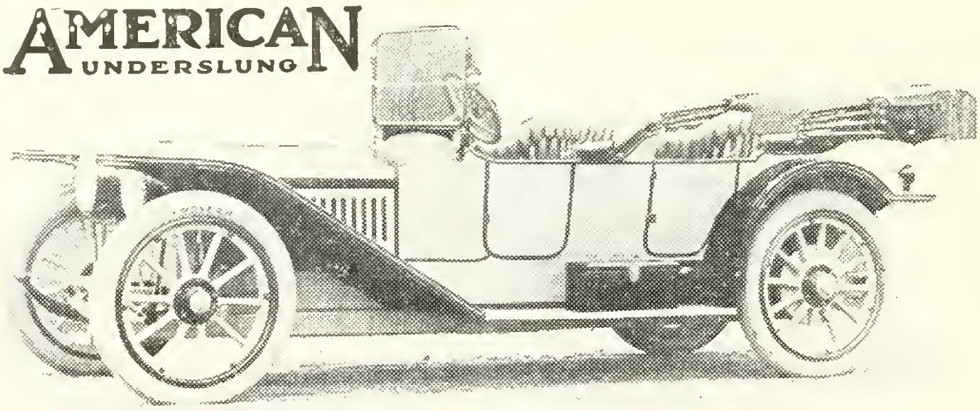
Women Motorists

London is at present suffering from an epidemic of women motor car drivers. Every one thought that motor driving for women, never a very popular pastime, had quite gone out, when suddenly it has become the fashion. The Duchess of Westminster always drives herself now in a big yellow car, and may often be seen coming up to town from her suburban retreat near Richmond, a smart chauffeur by her side to act in case of accidents. Miss Pauline Chase, the American actress, is another ardent motorist, and frequently threads her way calmly through the busy strand, and drives up to the Savoy grill room for luncheon.

Many of the prominent militant suffragettes employ female drivers, Mrs. Pethick Lawrence's able-bodied woman at the wheel being a particularly well known figure about the West End, and the fair taxicab driver threatens to become a fixture in the near future. Princess Mary, while at Balmoral, had some lessons from her brother, the Prince of Wales, who is a keen motorist, but the Queen absolutely declines to hear of her taking up the sport seriously. A number of the chorus lights at the Gaiety and Daly's are expert drivers, and can be met with on Sundays on all the main drives leading out of London.

AMERICAN
UNDERSLUNG



The American Underslung Six

Type 644—**$2,750** Complete

Four Speeds—132-In. Wheelbase—60 H. P.—Electrically Started and Lighted.

THE "American Underslung Six" is complete; it meets the universal demand for more power with greater economy in gasoline, oil and tires. The quality is undoubted—the same goodness is continued in this model that has long made the name "American Underslung" synonymous with excellence in motor car construction. Distinctiveness and luxury have been the keynote of our endeavors, combined with the manifold merits of the underslung frame and proven six-cylinder construction. Refinement is apparent in every line; true luxury reflected in every detail; and good hard motor sense in every mechanical feature. It appeals immediately to the motorist of taste and occupies the enviable position of a car built to meet the requirements of those who know good motor cars and good motor car construction.

These cars set another mile-stone in the wonderful progress of motor car building.

A Demonstration at Your Convenience

TYPE 666	TYPE 642	TYPE 422
Six cylinders, 75 H. P., six passengers, electrically lighted and started. Price $1500	Six cylinders, 60 H. P. two passengers, electrically lighted and started. Price $2750	Four cylinders, 32 H. P. two Passengers, electrically lighted self-starting. Price $1550

American Motors California Co.

TELEPHONE FRANKLIN 808 **476-482 Golden Gate Ave., S. F.**

American Motors Company, Builders, Indianapolis

Don't Drive in Rut

"Those mostly interested sometimes show the least consideration," says B. N. Pratt, Pacific Coast manager of the Fisk Rubber Company, in speaking about the use of highways by automobile owners. "What I mean by this is that automobile owners sometimes show a wonderful lack of appreciation of the value of saving of a bad road in their driving.

"Nothing shows the carelessness of a driver more than a bad piece of road. Not long ago, I traveled over what is known as the middle road from Redwood City to Palo Alto. The traffic had been diverted from the main highway to this road on account of the State road improvement. Before this road had to bear the whole traffic, it was a fair oiled road, in passable condition, and at times was better than the main county road.

"Just as soon as it had to bear the whole county road traffic it commenced to show its poor construction. It had been well oil soaked, and during the hot spells was exceedingly soft. A few heavy teams or other vehicles had passed over it, and made a track from practically one end to the other.

"These tracks from constant usage, that is one driver following the other, soon became as distinct as the rails of a railroad. The result was that the drivers of horse-drawn vehicles, following also in these tracks, cut up the middle section, and made it impossible before long for any one to drive except in these tracks.

"Finally they became so deep that they cut through the oiled surface into the road beneath. Every one knows that as soon as the oil crust is punctured, then comes a general breaking of the road.. The oiled surface breaks off, making dust holes, chuck holes, which are practically almost impossible to navigate. This is the condition at the present time of the middle road. If the drivers of vehicles had used a little forethought before driving over this road, and had not tracked and driven in the ruts made by other vehicles or started by them, the road to-day would be fair, instead of practically almost impassable.

"This same condition exists on the new State Highway. One has but to observe the smooth, tracking of vehicles to show that practically every driver is following the one before. This means that this particular section of the road has to bear the whole of the traffic instead of the whole road itself. If owners of motor cars would only bear this in mind, they will be able to enjoy the best condition of any road almost indefinitely. It will pay the owners of motor cars who employ chauffeurs to watch their driving, and to insist that they do not track after other vehicles."

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Just Missed A High Dive

Perched on the end of one leaf of a Chicago bascule bridge after a dash up the steep incline as the bridge opened, a heavy automobile not long ago hung by its front wheels until the bridge could be lowered. One of its occupants was thrown from his seat by the sudden stop high in the air, and was thrown into the river. The driver had not noticed the warning bell and red lights as he approached the bridge at a high rate of speed at night, and did not realize that the bridge was opening until his machine had started to climb the rising incline. While he struggled with the brakes, the car mounted to the end, thirty feet above the river, and stopped with its front wheels hanging over the edge. The bridge tenders reversed the machinery and lowered the bridge slowly, so that the car kept its position until it was brought down with its front wheels on one leaf and its rear wheels on the other.

You really *ride* on
Goodrich Tires

SEVENTY-FIVE per cent of your enjoyment and comfort in motoring depends upon your perfect confidence in your tires.

Quality of rubber and fabric and quality of workmanship, together with the Goodrich principle of unit molding, combine to make you realize that you really ride on

GOODRICH UNIT MOLDED TIRES
BEST IN THE LONG RUN

Your Goodrich dealer is ready to supply your wants today. Goodrich service covers the country from coast to coast. A satisfied customer is our best advertisement and we mean to keep you satisfied.

Write for the Goodrich Route Book, covering the auto tour you select. These books are sent free on request.

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Everything That's Best in Rubber

Branches and Service Stations in Principal Cities. Dealers Everywhere.

Factories: Akron, Ohio

There is nothing in Goodrich Advertising that isn't in Goodrich Goods.

Passing of the Malamute

The Motor Car Is Taking The Place of the Dog in Snow Bound Alaska

"In the distance, a panorama of snow-capped, cragged mountains, forming an uneven horizon; in the foreground, a gray, colorless vista of small trees and swampy niggerhead flats, stretching to the foothills of the Alaska range—that is the picture that presents itself to him who wanders to the outskirts of Fairbanks, Alaska's biggest and most metropolitan mining camp," says E. E. Hurja, in a Seattle paper. "On Cushman street, scarcely three-quarters of a mile from the heart of the city, stands a sign post, holding aloft a finger-board. The finger is pointed south, along a well-defined wagon trail, and the board bears the inscription, 'Valdez, 364 miles.'

"This, then, is the northernmost terminal of the Valdez-Fairbanks wagon road, pushed through from the coast, across two mountain ranges and miles of stream-cut valleys, under the direction of United States army engineers. The road is the route of the longest stage line in the world, some say, and it winds through a rugged, primitive and undeveloped country, gold-glamored and full of interest.

"The road is due to become the great Alaskan overland auto route from tide-water on the southern coast to Fairbanks in the interior, on the navigable side streams of the Yukon waterway system. Already has the distance between Fairbanks and Chitina, a stretch of trail 311 miles in length, been traversed by automobiles. The first auto to make the trip, a Ford touring car, took forty-five hours' running time to cover the stretch to the northern terminus of the Copper River and Northwestern Railway.

In the early days of the North, when the Klondike was being gutted of its riches, the dog team was the pioneer's means of travel; soon after Fairbanks was discovered, some hundreds of miles up the Tanana Valley from the Yukon, automobiles began to appear on the newly graded streets of the citified mining camp on the shores of Chena Slough. Now the automobile is as much a part of the life of that twentieth century frontier community as is the dog team. The noisy benzine buggy has displaced, in a measure, the Malamute and the horse, so useful in the early pioneer life of the district.

"The use of the motor car in Fairbanks may be described as being many-sided. Among other things, it is used for business, for pleasure, for emergency and for publicity. In business, it carries merchants from Fairbanks to the creek settlements on the occasional trips; it carries miners into town with their gold; it carries letters and packages to and from the creeks, and it is useful in freighting supplies from one district to another. In pleasure, the uses are manifold. Despite occasional severe sub-zero cold in the winter time, the cars can be used over the snow-covered trails as well as over the dry dirt roads of midsummer. For hunting, fishing and picnicking, the car is now an invaluable adjunct. For 'joy rides' it is as useful as in many an outside community.

"The auto in Fairbanks is always in readiness for emergency calls from the creeks. In drawing attention to the metropolitan side of life on the last frontier, the automobile serves a more novel purpose. Considerable publicity has been given Alaskan communities through the presence of an auto in pictures coming from a land which popular fancy has pictured to be covered the year round with snow and ice, and which is believed to be devoid of flowers or other vegetation.

"There is considerable roadway available for automobiles in the immediate vicinity of Fairbanks, estimated of about 150 miles' length, aside from the overland trail. The roads are most of them graded; the little creeks are bridged, and the soft, mucky spots are corduroyed in substantial fashion.

"The trails can be used by autos at all seasons, with the exception of a short period in summer, when there is an excess of rainfall. Between Fairbanks and the various creek towns, Fox City, Gilmore, Chatanika, Cleary City, Fairbanks Cree, Dome City, Olnes, Ester City and other communities, the roads to the creek settlements take the autos through interesting stretches of country, and within sight of many regions of strife and squabble connected with the early mining life.

The roads traverse the hilly country, with its groves of tall, stately, silvery-barked birches, past occasional road-houses where weary mushers and tongue-tired teamsters put up for rest. The cars thread their way between high flume-ways, under trestles that support long strings of sluice boxes, past large, forbidding looking piles of tailings; then again, the cars move past ever-growing heaps of golden dirt, within hearing distance of the boiler houses that dot the claims on the busy creeks, where the very atmosphere is saturated with the gold-getting fever.

"On some creeks the traveler on the auto sees the transition from the placer to the quartz mining camp. The open-cut placer mining gives way, near the heads of the creeks, to quartz prospects, some with their noisy stamp mills busily crushing the gold-laden rock for its valuable yellow contents.

"When a miner is injured on the creeks—when a slab of dirt comes down on a worker in the drifts, when an explosion of much scalds the pointman, the auto is called into service. An emergency call to town usually brings out the doctor, or, if the injury is one that demands immediate surgical attendance, the miner is rushed to the hospital as fast as the roads will allow the chauffeur to operate his car. When a storm or slide takes down the telephone wires, the auto is pressed into use to carry messages to the creeks. The passenger and express business between Fairbank and the creeks is profitable to the automobile men as well as to the miners, who are able to bring in their pokes of dust and nuggets, transact their business at the banks and in the stores, and return to their work on the creeks before a few hours have gone by.

"Trucks, of which two have been imported and put into use in the Fairbanks district, are serviceable in carrying supplies and freight from city to camp. In 1912 a truck came for Jacob Samuelson, a merchant at Richardson, some seventy-five miles from Fairbanks. He has made good use of the machine in hauling supplies to be used by the miners of the ten-

derfoot mining district. During the past summer, J. H. Groves took in a powerful truck. As soon as it was wheeled off the barge on which it traveled from St. Michael to Fairbanks, a mechanic put it in operation, and within half an hour the truck was hauling a mammoth load of gasoline from the boat to the Groves' warehouses. The truck carried loads with ease that would have required at least three teams of horses to haul.

"During the Fourth of July celebration at Fairbanks this year autos were very much in evidence. To some it looked as though every one of the twenty or more automobiles in Fairbanks was buzzing along the streets in endless procession. Many sourdoughs who were in from remote districts for the celebration, and who had not been outside since they first went North, were surprised and dumbfounded at this apparent metropolitan feature or Fairbanks life.

There are women drivers in Fairbanks, too. Mrs. Roy Rutherford has the distinction of being the first woman in Fairbanks to drive her own automobile.

"In the fall, when the vacation period is on, autos make the trip over the Valdez trail for a distance of about sixty miles to Birch Lake, where there are hunting and fishing in abundance and where swimming and boating help to make the days pass quickly. The run is made easily in a day, allowing ample time for stop-overs at the roadhouses along the trail. Not far from the train, moose, caribou and mountain sheep may be hunted.

"Auto owners go out in the early morning for five or six miles over the trail, and from their machines they shoot grouse and rabbits on either side of the trail.

"In winter, pleasure parties hire autos and visit roadhouses as far away from Fairbanks as Munson's, forty miles distant. The car leaves Fairbanks in the morning, and as the trails are hard and smooth, and the little ruts and holes are packed full of snow, the speeding is good. A stop for lunch is made at a roadhouse conveniently situated, and the car proceeds on its way southward. In the distance, the jagged peaks of Mount Hayes are visible, covered with snow and magnificent with the sun's rays striking the ice-pinnacled faces of the mountain.

"Past the Indian vilages in the Salchaket district, with a noise that startles the peaceful Alaskan native in his mud-chinked cabin, the car proceeds until the snug-looking roadhouse of Munson's hoves into view within its fenced inclosure. There bountiful meals are provided by the general roadhouse people, and after several hours of sight-seeing in the afternoon, the car starts back with the pleasure-seekers.

"The auto is in Alaska to stay. There is no doubt of that. The present year has seen at least eight more automobiles go into the Tanana camp. They vary from the high-priced 60-horsepower touring car to the little, comfortable runabout. The sourdough has accepted the automobile with all its intricacies and troubles for the uninitiated, and the "Mush on, mush on," that he used to know when emitting blue-smoked words at a team of straining, tugging malamutes, is to be replaced by the newer and more technical 'cussing' that all automobile men know.

"In Fairbanks, where the autos, in holiday attire, carried loads of pretty damsels about last Independence Day, some of the natives from the nearby missions came in and got their first glimpse of the horseless buggy.

"From the North will soon be coming news of speed ordinances, passed and approved by the city council of Fairbanks. And when an ordinance comes, it will be an official recognition of the permanence of the automobile in the biggest mining camp of the 'last frontier' country. Besides, the speed ordinance will have the honor of being the 'farthest North' one on the North American continent."

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The Standard Oil for Motor Cars

The oil that keeps your motor cool by means of its perfect lubricating qualities. ZEROLENE is put up in the flat shaped can—easy to handle. Also in barrels and half barrels, and where we maintain tank wagon service, we will deliver Zerolene in bulk direct to your garage. This is the convenient, economical way to buy your lubricating oil.

Dealers Everywhere and at all Agencies of the

Standard Oil Company

(CALIFORNIA)

San Francisco

AUTO OWNERS

Why take chances on your Ignition? Insist on using

RAJAH PLUGS

Do you know Rajah Plugs cost supply-houses three times as much as the cheap ordinary plugs?

Some reason for their boosting the plug which pays them the long profit.

Why are all these plugs similiar in appearance to the "Rajah?"

They all know that

"Rajah MEANS Quality"

Insist on the Genuine

Hughson & Merton, INC.

530 Golden Gate Ave. San Francisco

Samson And Peerless | Inner Shoes

Endless in shape and strength. Guarantee you double mileage and insure your pleasure.

Agents wanted everywhere, liberal inducements.

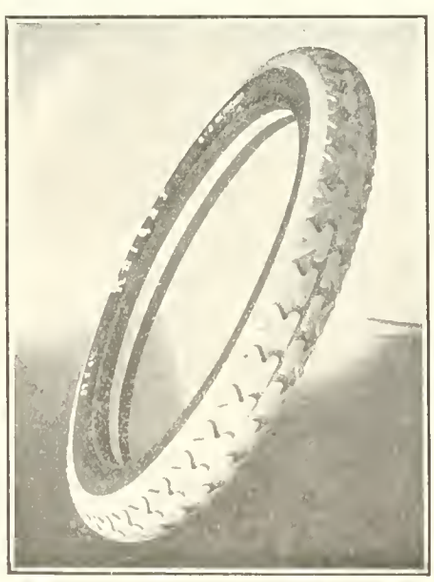
Jackson-Eno Rubber Co.

Los Angeles, Cal.

Manufacturers of Rubber Tire Sundries

For the first time in the history of the tire industry, the highest possible quality of automobile tires, regardless of the necessary cost, are offered on the general market at a fair profit.

Knight Tires reduce the possibility of tire troubles to an absolute minimum.



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PHONES

Franklin 6823 Home J 2012

Autos in Alaska

Motor Truck Proves its Value Over Other Transportation

Because of the unrestrictive conditions placed on railroad development in Alaska, five big motor trucks will be used to haul ore from the Mother Lode mines to the head of the Copper River and Northwestern Railroad next summer. Under other circumstances, a short spur railroad would have been built.

Under the federal law that was passed many years ago, and by which railroads are taxed $100 per mile per annum, and every other form of business or industry in the territory was taxed in varying sums from $25 to $2,500 per mile—excepting newspapers and barber shops—automobiles were overlooked and exempted from taxation. Another condition that militates against the successful operation of railroads is the tax on coal that has to be brought from British Columbia or Australia. Hence the Mother Lode Company decided in favor of the automobile.

"We had planned to build a tramway," says George E. Baldwin, "but found that the taxes on it would be $100 per mile, the same as on the railroads. As we would only operate about 100 days a year, this would cost us a considerable sum, to say nothing of the cost of hauling coal from British Columbia with which to operate it. We can haul gasoline much cheaper. In addition to the $100 per mile tramway tax, we would be compelled to pay a dockage tax of $10 a ton on all ore shipped. I presume we may have to pay this, anyway. We were charged for 350 tons which we shipped this summer.

"Under these conditions, it is impossible to work anything but the highest grade ores at present, but we plan to put in a concentrating plant next year and ship the concentrates. If the Alaskan coal were opened to development, it would make a tremendous difference in our reduction cost, as the ore would be smelted on Prince William Sound, and we would be saved the cost of shipping the waste material, which is thrown away at the smelter at Tacoma, but upon which we have to pay freight and taxes."

AUTOMOBILE MEN & OWNERS.
ATTENTION!!
THE "WESTERN CHALLENGE" PERSONAL ACCIDENT POLICY OF THE MIDLAND CASUALTY COMPANY IS JUST THE ONE YOU WANT.
—WHY?—
ASK ANY AUTOMOBILE OWNER. ASK HIM HOW QUICKLY WE PAID HIS CLAIM IN FULL WHEN HE WAS HURT
OR ASK
EDWARD P. FISH & SON
GENERAL AGENTS
703 MERCHANTS EXCHANGE, SAN FRANCISCO, CALIF.

Phone Sutter 300 Pacific Sightseeing Co., Prop.

FOURTH ST. GARAGE
FOURTH & HARRISON STS.
SAN FRANCISCO
Commercial Trucks A Specialty
Automobile Supplies
The attention of owners of pleasure cars living in San Mateo County is called to the convenience of this Garage to Third and Townsend Street Depot.
THE LARGEST GROUND FLOOR FIREPROOF GARAGE WEST OF CHICAGO

LARKINS & CO.
Carriage and Automobile Body Builders
Established in 1865
Announces the removal of their Offices and Factory to
1610-1612-1614 Van Ness Avenue
Between California and Sacramento Sts.
Phone Prospect 30
Where their entire attention will be devoted to the prompt delivery of the best work that a modern plant, high-class mechanics and materials can produce.

AUTO FENDER & RADIATOR WORKS
Make and Repair
Fenders, Radiators, Hoods, Metal Bodies, Tanks
Dash Shields, Lamps, Mud Pans, Tool Boxes, Metal Spinning, Etc.
466 Golden Gate Ave. Phone Franklin 6460
32-34 Van Ness Ave. Phone Market 6409

EMPIRE
Model 31
"The Little Aristocrat"
Completely Equipped $950
The Completely Equipped Empire five-passenger touring car $950 Equipment includes Mohair Top and Top Envelope, Demountable Rims, Rear Double Tire Irons, Extra Rims, Accelerator, Windshield, Prest-O-Lite tank, Horn and Speedometer.
The Empire Automobile Co. Indianapolis, U.S.A

AUTOMOBILES AND TOURISTS' BAGGAGE
INSURED AGAINST
Fire, Theft and Transportation
While anywhere in United States, Canada and Europe
ÆTNA INSURANCE CO.
OF HARTFORD
PACIFIC BRANCH—325 California Street, San Francisco

Tips to Automobilists

(CUT THIS OUT.)

The News Letter recommends the following garages, hotels and supply houses. Tourists will do well to cut this list out and keep it as a guide:

SANTA CLARA COUNTY.

SAN JOSE.—Stop at LETCHER'S New Garage for first-class service. We cater to the touring public. Attractive parlors for ladies in connection. "Mission Front" garage next to corner of First and St. James Sts.

SAN JOSE.—Lamolle Grill, 36-38 North First street. The best French dinner in California, 75 cents, or a la carte. Automobile parties given particular attention.

PALO ALTO.—PALO ALTO GARAGE, 443 Emmerson St. Tel., P. A. 333. Auto livery at all hours. Tires and sundries in stock. Gasoline, oil, repairing, lathework, vulcanizing. Open day and night.

PETALUMA.—PETALUMA GARAGE AND MACHINE SHOP. Sparks & Murphy, Props. Cor. Third and C Sts; Phone Main 3. Automobiles, general machine work and gear cutting, supplies, repairing, auto livery, lubricating oil and gasoline, the care and charging of storage batteries.

HOTEL VENDOME
SAN JOSE, CAL.
Headquarters for Automobilists touring the beautiful Santa Clara Valley.
American and European Plan. Reasonable Rates.

PEART & ELKINGTON
Phone Market 6370
VULCANIZING
42 Van Ness Avenue
SAN FRANCISCO, CAL.

Leading American Cars

AMERICAN UNDERSLUNG

American Motors California Co.
476-482 Golden Gate Ave.
San Francisco

Prices F. O. B. Factory

Models			Prices
422	4 Cylinder, 2 Passenger	30 H. P.	$ 1550
642	6 Cylinder, 2 Passenger	60 H. P.	2750
644	6 Cylinder, 4 Passenger	60 H. P.	2750
646	6 Cylinder, 6 Passenger	60 H. P.	2950

COLE

PACIFIC MOTOR CAR CO.
Golden Gate Avenue and Polk St., San Francisco
Prices F. O. B. San Francisco.

Models—	
4-cyl. 2 Pass. Roadster	$2050
4-cyl. 5 Pass. Touring	2050
4-cyl. Coupe	2500
6-cyl. 2 Pass. Roadster	2750
6-cyl. 4 Pass. Demi-Tonneau	2750
6-cyl. 7 Pass. Touring	2750
6-cyl. Coupe	3150
6-cyl. Limousine	4150

HUDSON

H. O. HARRISON
1036 Van Ness Avenue San Francisco

Standard Models
Prices F. O. B. Factory.

Model "37 37 h. p.		Model "54" 54 h. p	
Touring Car	$1875	Touring Car	$2450
Phaeton	1875	Phaeton	2450
Roadster	1875	Roadster	2450
Limousine	3250	Limousine	3750
Coupe	2350	Coupe	2950

Buick

HOWARD AUTOMOBILE CO.
San Francisco
Prices F. O. B. Factory.

Models	Prices
24 Runabout	$950
25 Touring Car	1050
30 Roadster	1125
31 Touring Car	1285
40 Touring Car	1650

EMPIRE

OSEN-McFARLAND AUTO CO.
San Francisco and San Jose

Model—	Price
Empire 31	$1050

5-Passenger touring car, completely equipped.

LOZIER

BEKINS-SPEERS MOTOR CO.
Van Ness Avenue San Francisco
Type 72 Prices F. O. B. Factory Type 77

Model—	Price	Model—	Price
7-Pass. Touring	$5000	5-Pass. Touring	$3250
5-Pass. Touring	5000	2-Pass. Runab't	3250
4-Pass. Touring	5000	5-Pass. Limous'n	4450
4-Pass. Toy Ton.	5000	5-Pass Limous'n	4450
2-Pass. Runab't	5000	3-Pass. Coupe	3850
7-Pass. Limous'n	6500		

CASE

J. I. CASE T. M. CO., INC.
San Francisco.
Standard Models
Prices of Cars Completely Equipped F. O. B. Factory.

Model		H. P.	Price
5-Pass.	Touring	25	$1250
5-Pass.	Touring	35	1850
5-Pass.	Touring	40	2300

Ford — THE UNIVERSAL CAR

PACIFIC KISSEL-KAR BRANCH
Van Ness and Golden Gate Aves., San Francisco
We Sell on Easy Terms
Standard Models
Prices F. O. B. Factory.

Model—	Price
Touring Cars	$550
Runabouts	500
Town Cars	750

Marion

MARION MOTOR CAR CO.
555 Golden Gate Avenue San Francisco
Prices F. O. B. Factory.

Model	H. P.	Price
37-A Touring	40	$1475
48-A Touring	48	1850
36-A Roadster	40	1425
38-A Roadster	40	1475

All Cars Completely Equipped.

Chalmers

PIONEER AUTOMOBILE CO.
1913 Models
Prices F. O. B. Factory.

Prices for 1914 Cars are as follows:

Model 19, 4 Cyc. 36 H. P. 4 or 5 Pass. Cars	$1925
Model 24, 6 Cyc. 45-60 H. P. 2-4 and 5 Pass. Cars	2325
Model 24, 6 Cyc. 45-60 H. P. 6 Pass. Cars	2425
Model 24, 6 Cyc. 45-60 H. P. Coupe	3000
Model 24, 6 Cyc. 45-60 H. P. Limousine	3850

All prices include full equipment and are f. o. b. Detroit.

HAYNES

HAYNES AUTO SALES CO.
Turk at Polk St.
Prices F. O. B. Pacific Coast.

Model 24—2, 4 and 5 Pass. (4-cyl.)	$1,950
Model 24—Coupe (4-cyl.)	2,400
Model 23—2, 4 and 5 Pass. (6-cyl.)	2,700
Model 23—6 Pass. (6-cyl.)	2,950
Model 23—Coupe (6-cyl.)	3,200
Model 23—Limousine (6-cyl.)	3,850

MARMON

MORRIS KENNEDY CO., INC.,
545 Golden Gate Ave. San Francisco
New Series Marmon "Thirty-Two"
Prices F. O. B. Factory.

Mod. Thirty-Two Chassis	$2500	Landaulet	$4100
Five-Pass. Touring Car	3000	Marmon "Six" 2, 4, 5 and 7-passenger	$5000
Four-Pass. Suburban	3000	Limousine	6280
Roadster	2900	Landaulet	5350
Speedster	2850	Berline Limousine	6450
Limousine	4000		

A Ten Year Tour

Dr. L. C. Harvey, of Upland, Cal., near Los Angeles, after working for years to make an ideal touring outfit, has announced that he has succeeded, and will start with his wife and son on a ten or twelve year tour throughout the United States, Canada and Mexico. Dr. Harvey has constructed a trackless train which provides every comfort and even many of the luxuries of home. His motor caravan, consisting of the auto and two large inclosed wagons, has in the equipment electric lights, running water, screen doors, spacious beds, writing tables and a library. And, should the doctor decide to leave the bulky wagons of the train behind, he can detach the motor car and tour about with all the comforts still at his command. For on a smaller scale he has duplicated the living facilities in the auto, which serves as a tractor. The car, together with the various other conveniences, has cost nearly $10,000. The wagons are of special construction throughout. The running gear is the best, with roller bearings and springs, and equipped with air brakes. The floors are maple, the framework of hickory, and the siding and ceiling of oak. The couplings are arranged so that the two wagons pulled by the car will trail around corners and curves in the same tracks where the machine goes. The water system is arranged with a fifteen gallon tank under the car. This tank is connected to the air line that operates the air brakes, and the pressure forces the water to the sink for cooking,

With Models and Prices for the Convenience of the Buyer

MICHIGAN

MICHIGAN MOTOR CAR CO.
California Branch
283-291 Golden Gate Ave San Francisco
Imperial Garage—Oakland

Standard Models

Model—		Price
"L" and "O"	33 h. p	$1690
"R" and "S"	40 h. p.	1875

Maxwell

UNITED MOTORS S. F. COMPANY.
Polk St., near McAllister San Francisco

Prices F. O. B. Factory.

Model 25, 5-Pass. Touring Car	
Model 35, 5-Pass. Touring Car	$1085
Model 40, 5-Pass. Touring Car	1550
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STANLEY STEAM CAR CO.
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4-Pass. 20 h. p.	1890
5-Pass. 20 h. p.	1890
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12-Pass. 30 h. p.	2500

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Prices F. O. B. Factory.

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"40" 4-Pass. Torpedo	2000
"40" Limousine	3000
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"32" Model RX Roadster	1450

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Roadster	$[illegible]	7-Pass. Touring	$[illegible]
Toy Tonneau	[illegible]	Limousine	[illegible]
5-Pass. Touring	[illegible]	Landaulet	[illegible]
6-Pass. Torpedo	[illegible]	Coupe	[illegible]

dish-washing and drinking. The radiator on the car is also connected to the water tank and is kept constantly filled for the extra cooking needed at the slow speed, while pulling the train. An air tank on the tractor is kept filled, the air brakes are operated, the water forced to the pipes, the horn blown, and the motor started. The electric lights are supplied from a storage battery, which is kept charged by a dynamo on the auto. This supplies all lights on the car, as well as furnishing light for all purposes.

Troubles of Self-Starters

Electric cranking motors usually take the current through "brushes" from the storage battery. Sometimes these brushes fail to make good contact, and are the cause of inefficiency. When the electric motor fails in power, these brushes should be carefully examined. Sometimes one of the cells of a storage battery goes down before the rest, and the two remaining cells cannot furnish required power to crank the engine. Sometimes a grain of dust will get between the contact points of a switch and make a whole lot of trouble.

* * *

——Fifteen grains of Trional powder, taken in a little sweet milk at bedtime, after a long drive, will give refreshing sleep, with no harmful results.

* * *

——When a nut or bolt is in such a position that a wrench cannot be adjusted to turn it, cut a slot in it with a hack saw, and turn with a screw-driver bit.

Lights Ordinance for New York

Mayor Kline, of New York City, has approved an ordinance passed by the Board of Aldermen amending the rules of the road, as they apply to horse-drawn and motor vehicles. The amended ordinance reads as follows:

"458. Lights—Each and every vehicle using the public streets or highways of this city, except vehicles of licensed truckmen, shall show between sunset and sunrise a light or lights so placed as to be seen from front and each side; if dash lantern is carried, it shall be placed in the left hand side; such light or lights to be of sufficient illuminating power to be visible at a distance of 20 feet; said light or lights shall show white in front, but may be colored on the sides, excepting licensed truckmen. Every automobile shall exhibit during the same period two lamps showing white lights visible at a distance of 300 feet in the direction toward which the automobile is proceeding, and shall also exhibit a red light, visible in the reverse direction. The lamps shall be so placed as to be free from obstruction to light from other parts of said automobile. No operator of any automobile or other motor vehicle, while operating the same upon the public highway within the city shall use any acetylene, electric or other headlight unless properly shaded, so as not to blind or dazzle other users of the highway, or make it difficult or unsafe for them to ride, drive or walk thereon. In the Borough of the Bronx, excepting south of Tremont avenue and 177th street, east of Jerome avenue and west of the Bronx River, and in the Boroughs of Richmond and Queens, and in the Twenty-sixth, Thirtieth, Thirty-first and Thirty-second wards of the Borough of Brooklyn, every car or other vehicle between said hours, while moving on along or standing upon the portion of streets in said burroughs or parts of boroughs, shall carry a light or lights of such illuminating power as to be plainly visible 200 feet both ahead and behind said car or vehicle."

ð ð ð

——One source of insufficient lubrication of bearings is sometimes found to be clogged grooves in the bushings. Sediment will accumulate in the grooves, which are intended to carry the lubricating oil, and shut off the supply. An excess of graphite will often produce this effect.

ð ð ð

——Non-reversible steering gears usually have a certain amount of back lash to allow the wheels to follow ruts without side resistance on the tires.

Touring Accessory

A device for pulling motor cars onto solid ground when their rear wheels have sunk into mud holes or deep mud, and the car cannot be moved by its own power, is now out. In using the appliance, one end of it is attached to the front of the rear wheel, and when the motor is started, the device, which somewhat resembles a large razor strop, is dragged under the wheel. The loose end of the appliance is then carried forward, and fastened to a stake in the ground. Upon starting the motor a second time, the car is quickly drawn out of the mud and onto solid ground.

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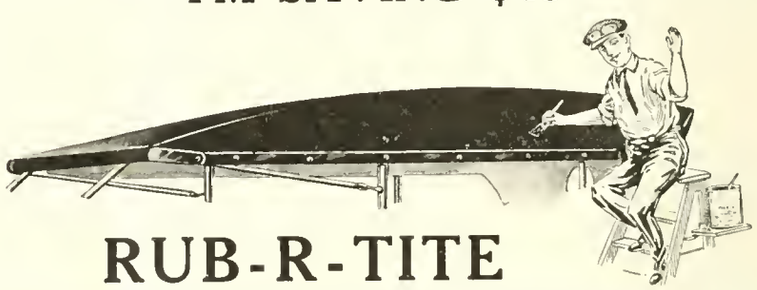

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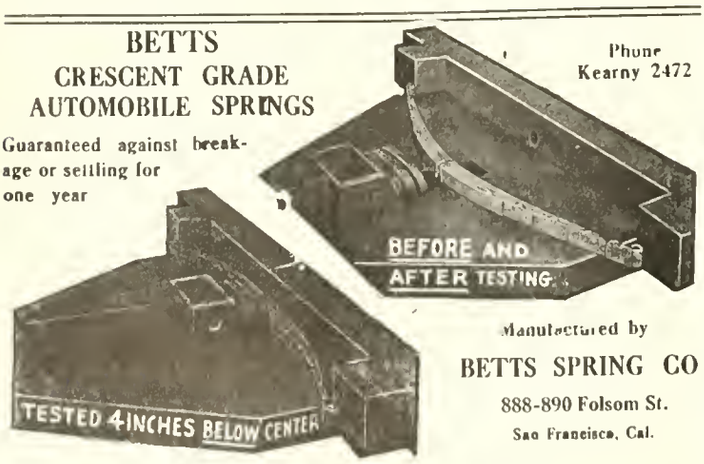

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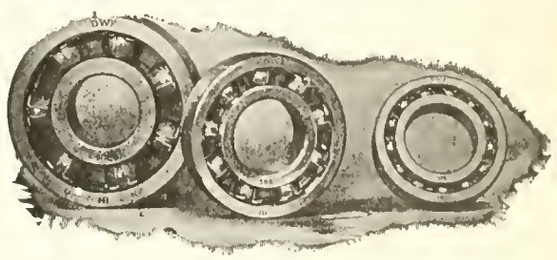

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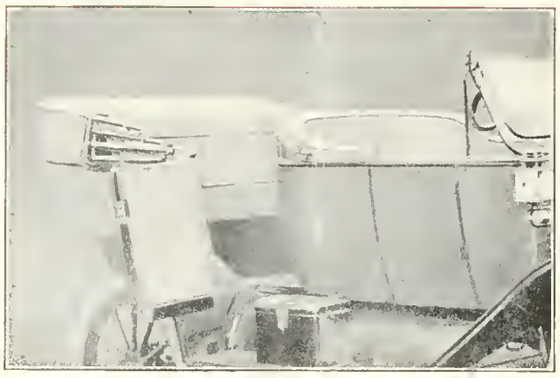

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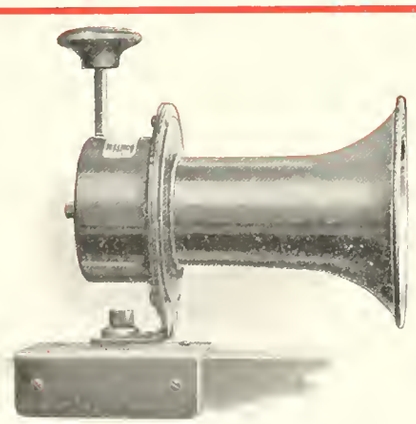

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MOTORING MAGAZINE AND MOTOR LIFE

Published Monthly by the Proprietor Frederick Marriott, at the Office 21 Sutter Street, San Francisco, California
DEVOTED TO THE MOTORING INTERESTS OF THE PACIFIC COAST

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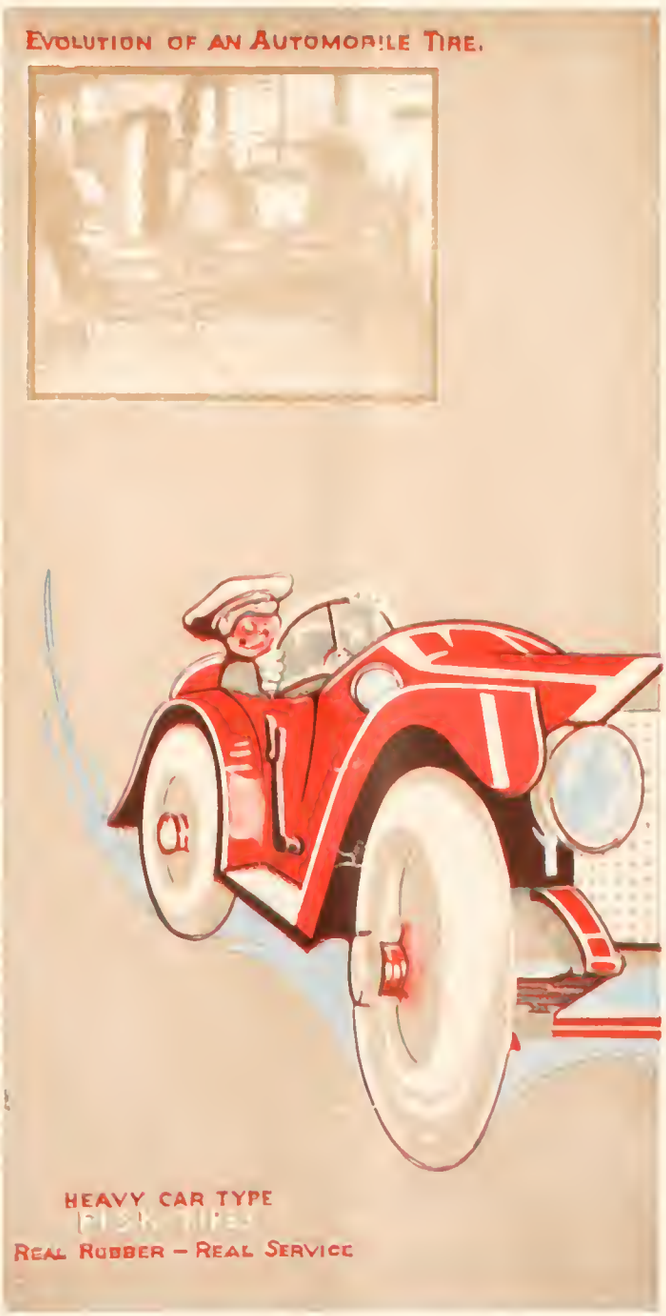

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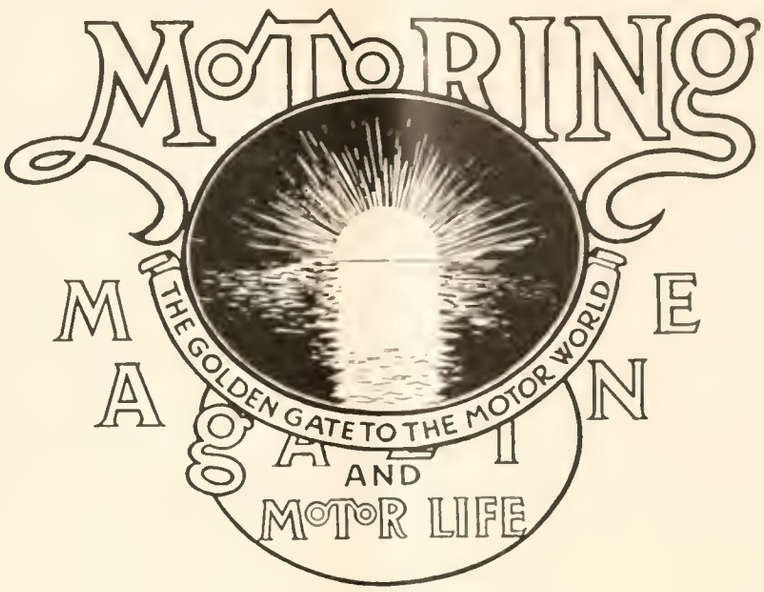
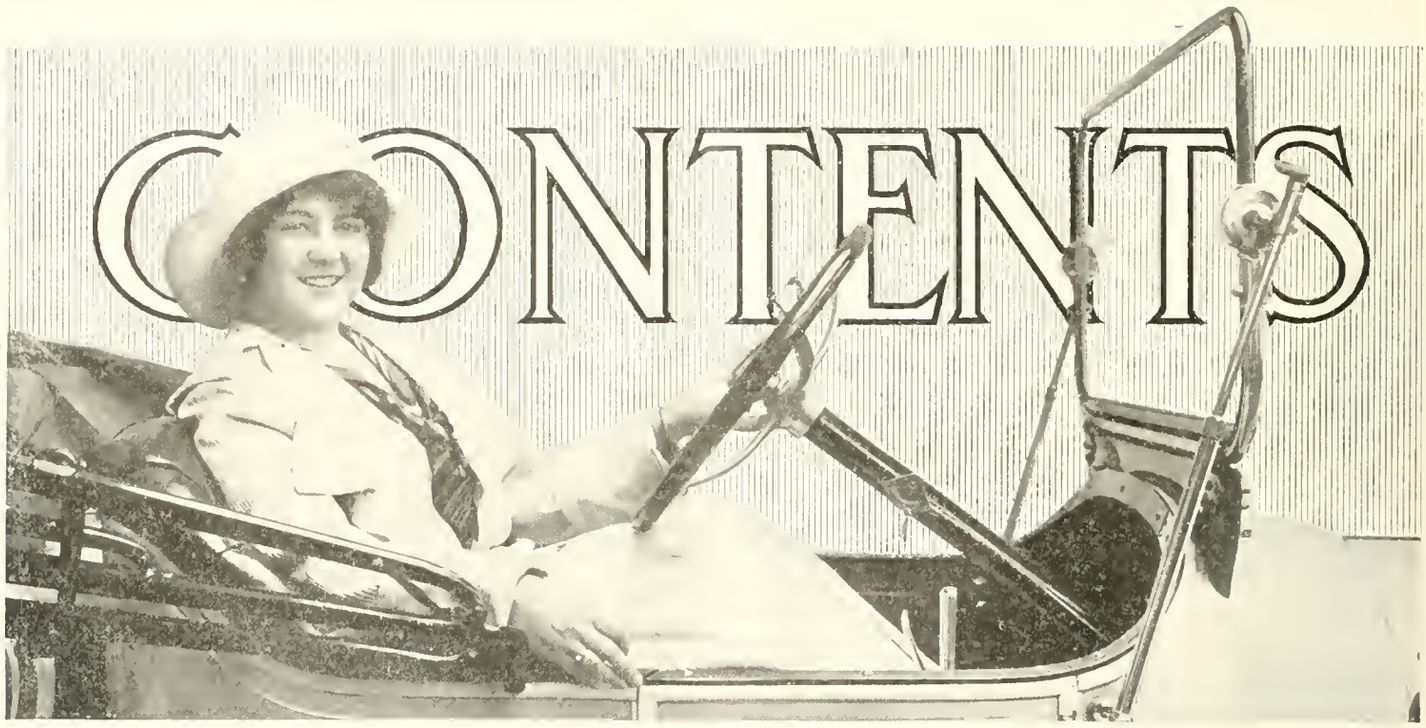


As Father Time leads the decrepited year of 1913 to oblivion Motor Magazine in this, the December number, reviews some of the interesting incidents of the past.

One wonders where the racing cars of yesterday have gone. Some are still struggling for existence and of these a record is now here given.

Still with the thought of yesterday a chronicler tells for the first time of a wild ride through Pacheco Pass to meet the world famed racing car that was struggling for supremecy in hard winter's drive through snow, sleet, and rain from New York to Paris.

Also is reviewed much of the good road work accomplished during the last twelve months on the Pacific Coast.



CONTENTS

DECEMBER, 1913

Editorial 1
Pacheco Pass 3
Good Roads Make Good Roads 5
Firestone Service Station 6
Big Increase in Auto Exports 7
Hard Mud Plugs in Oregon 8
Where are the Racing Cars of Yesterday? 9
Mayfield Street to be Paved 10
Of Interest to Motorists 12
Queer Requests for Auto Numbers 14
Believes in National Highway 15
Umatilla County's Tax Levy for Good Roads 15
A. A. A. Elects Officers 15
Guests Take Risks 15
No Auto Tax if Machine Men Win 15
From Out of the Northwest 17
Olympic Highway 18
Over the Siskiyou Mountains 19
Baker County Roads 19
The New Chandler for 1914 22
Repair Roads 24
Rajah vs. Rex 24
Repair Cuts in Treads 24

Vol. V December, 1913 No. 6

MOTORING MAGAZINE and MOTOR LIFE

Published Monthly by the Proprietor Frederick Marriott
at the Office 21 Sutter Street, San Francisco, California

DEVOTED TO THE MOTORING INTERESTS OF THE PACIFIC COAST

MOTORING MAGAZINE
AND MOTOR LIFE

Pacheco Pass

One of the Most Scenic Parts of the New Yosemite-to-the-Sea Highway

By R. R. L'Hommedieu

The boulevard or improved highway known as the Yosemite-to-the-Sea, takes in one of the most picturesque passes in the State of California. This road is known as Pacheco Pass, and connects Santa Clara Valley with San Joaquin. It is by far the shorter route to Fresno and the other important cities of the San Joaquin Valley than by way of the passes over the mountains south of Oakland.

The mention of Pacheco Pass brings very forcibly to mind a wild ride that took place some years ago when the official pilot of the Automobile Club of California went through the Pass to meet the Thomas car which was leading in the race from New York to Paris.

The pilot car was driven by Calvin C. Eib, one of the pioneers in the automobile trade of San Francisco. In the car, besides the writer, was William Hunt, the official representative of the Santa Clara Automobile Association and the official photographer.

The pilot car left San Francisco by the Oakland ferry to pick up the racing car. Word had been received that it had reached Bakersfield and was coming up the San Joaquin Valley. Reaching Haywards, telephone communications were opened with the city and down through the valley to find just where the racing car was. In this the pilot was unsuccessful, inasmuch as no word could be obtained as to their location. Then traveling further on down to San Jose, the telephone lines were again brought into use, but with the same results.

It was a certainty that the racing car was coming up the San Joaquin Valley, but whether it would come through Pacheco Pass or continue on up to Livermore and then over by Dublin was not known. It was decided to travel on and take Pacheco Pass.

Reaching Gilroy, the telephone was brought into play again, but with the same result. By this time it was almost time for dinner; in fact, those in the car felt the necessity for food, but as the racing car had not been located, it was decided not to stop, but to proceed on through Pacheco Pass and try and head them off before they reached Los Banos. Leaving Gilroy, the run to San Felipe at the beginning of Pacheco Pass was made in short order.

It was found there that San Felipe would be the last telephone station that could be used until the car had got through the pass. Therefore, it was decided to again try and locate the racing car. After opening up the wire with San Francisco and practically every principal town in the San Joaquin Valley, it was found that the car had passed Fresno, but that was all the information that could be learned.

While the telephone was being used, some one suggested a sandwich to appease the hunger of the party, a fried-egg sandwich was ordered, when somebody else suggested "make it two." The brainy cook of the hotel took the order, and when he appeared, he had two fried eggs between two large pieces of bread measuring over three inches thick.

In the heart of Pacheco Pass, on the edge of the mountain side which drops almost perpendicular two hundred feet to the bottom of the canyon.

The Mountain House, which crowns the summit of Pacheco Pass.

There was no time to stop to get extra bread to segregate the eggs, so those in the party proceeded to stretch their mouths over the eats. This produced some great gymnastics on the part of those who indulged in the feast, inasmuch as the eggs had not been cooked hard, and after a couple of bites broke, and there was some fine work trying to save the contents of the sandwich.

Half-past nine saw the pilot car on its way. Eib, who was driving, had never been through the Pass, but put on all speed, and shortly we were in Bell station. A stop was made at this point to try and see if any word had been received of the racing car. The pilot car had no more than come to a stop than it was realized that something unusual had happened at the station. Investigation proved that there had been some sort of trouble, and that one person was shot dead, which heightened the excitement of the trip that was already at a nerve racking point.

Leaving Bell station, the car was whipped through the Pass at a tremendous speed. Soon the Mountain House came in sight. A stop was made here to ask for road instructions, as the country there looked as if we were going into the open. Some half hour was necessary to wake up the inhabitants, who seemed to be dead to the world in sleep.

Finally getting under way once again,, the rest of the pass was made, and the start out into the open country, following the instructions given at the Mountain House.

A finer lot of roads set at right angles cannot be found anywhere outside of the country just leaving Pacheco Pass. After turning up and down several of these, the party finally realized that they were lost, especially when they were brought up in the backyard of a rancher who came to the window after a flock of dogs had made the night hideous with their snarls and barks.

Finally the road to Volta was found, and then on through Volta the car soon reached Los Banos at 1 o'clock in the morning.

Luck was with us, for when we reached the town we found that the Thomas car had arrived about an hour earlier, and after taking a midnight meal, the racing crew had gone to bed with the instructions to be called at four-thirty.

There was nothing to do now but to wait until four-thirty, and in the meantime some one suggested that the party partake of the postponed dinner. Waking up a Chinese restaurant keeper, some cold meat and hot coffee was produced, and the inner man appeased.

Then all hands went over to the hotel to take a couple of hours' rest. One can imagine the chagrin and surprise when informed that the hotel was full, and not a room could be had. After skirmishing around town another one with dubious accommodations was found and the party went to bed.

The aspect of the hotel was not inviting, but it was "any port in the storm," so most of the party laid down with their clothes on. The official photographer happened to be in the room with the writer, and hardly had sleep overcome the party when the writer was awakened by the photographer, who was hunting for a flea that he said was biting him. He was informed to roll over on it and try and kill it, but this did not seem to suit his fancy.

Hardly getting to sleep again, there was another noise in the room, and all the visions of burglars, cut-throats and wild mountain men came up before one's eyes. Awakening and shouting for the cause of the disturbance, the photographer asked that some one come and hold up the window, as he wanted to shut up a dog that was howling at the moon. An empty flask left by a previous visitor was the ammunition which, with a true aim, the photographer landed on the cranium of the dog. Hence no more noise from that dog that night.

As it was then a quarter to three, it was decided as four-fifteen was the hour of calling that it would be just as well to get up and wash.

It was a sleepy party that strolled up to the restaurant for the morning meal. However, the lack of sleep was soon lost in the excitement of following the victorious Thomas crew. A hasty breakfast and soon all hands were aboard with the pilot car in advance, starting on the homeward journey of the first lap of the race to San Francisco.

Only those who have started out touring with the breaking of the day can appreciate the ride that March morning. The air was just sharp enough to keep the blood in circulation. Back over the

Bell Station that marks the mid-way point through Pacheco Pass.

road to Pacheco Pass led the route, and shortly the pilot car and racer entered this well known road over the mountains.

The party was somewhat startled to see how close Eib had been driving the night before to the edge of the precipice. The tracks of the pilot car was still fresh, as no traffic had passed since the trip. While Pacheco Pass is marked by sharp declivities along its side, yet it has easy grades and good turns, and when put in first class condition will be a mountain pass that even the novice can easily make with safety.

Once through the pass, Gilroy was soon reached; then began the triumphant entry of the victorious car into San Francisco, for from this point on it was a greeting to victory. This, however, is another story, and does not affect the Pacheco Pass.

A week later the same party with another car and driver went across the pass to meet the French car which B. S. St. Cheffery was in command. On their return from Los Banos, the party had a better chance to appreciate the beautiful scenery of Pacheco Pass, having once been over it, the novelty of watching the route itself was gone, and there was time to pay attention to the scenic beauties of the road. There is no other pass in California that is more inviting than this one, especially when the summit is reached above San Felipe. Coming up through the pass, a sharp turn is made in the road at the summit, and at this point suddenly bursts into view the wonderful Santa Clara Valley.

We had been coming along at a fast clip with St. Chaffery driving the French car for all it was worth. As the summit was reached, a shouting in the French car attracted our attention, and we saw that they had come to a stop. Thinking that something had happened, we backed up, only to find that the wonderful beauty of the valley had held them spell-bound, and they wished to take in more of this wonderful picture.

The easy grade after leaving San Felipe as one enters Pacheco Pass.

One cannot appreciate the beauties of Santa Clara Valley without they see it on a March morning when the country is in bloom. Down on the floor of the valley were acre after acre of fruit trees bedecked in their white blossoms. Here and there was a large field of the California poppy, bright in its golden hue, standing out in all its glory of color. Then again were acres of the blue lupin and other wild flowers, massed together in a harmonious whole, that charmed the artistic mind of mankind. It was a picture painted by a masterhand—by the Great Creator of the world.

The picture on that March morning is one that will never fade from the memory. While Pacheco Pass is but one of the several passes that are a part of the road from Yosemite-to-the-Sea, yet it will stand out the most prominent from its many attractions.

The completion of this road will mean that the motorists leaving San Francisco can tour down to Santa Cruz, then across this Yosemite to the Sea road, visit the great natural wonders of the valley, and thence proceed back by way of Stockton and over through Livermore, and thence through the beautiful Dublin Pass to San Francisco, making a loop out of San Francisco that will be well worth the journey.

The open road on the Santa Clara side as one approaches Pacheco Pass.

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Good Roads Make Good Roads

It is universal experience that one mile of good road breeds another mile. Put a State-wide good road down anywhere in this country, and in ten years there will be dozens of good roads reaching it from all parts of the State. Put down a system of National highways, built and maintained by the National Government, and the various State legislatures and county officials would soon see the advantages of connecting all parts of the States with those National roads.

There are 2,000,000 miles of roads in the United States, says the National Highway Association. The 50,000 miles of highway shown on the map is but a fraction over 2 per cent of this mileage. But improve these 50,000 miles into good roads, and keep them good roads by proper maintenance, and 50,000 miles more would grow almost over night, and then another 50,000 and another and another, until our great country, with its huge territory, would be crossed and recrossed with good roads, as France is today.

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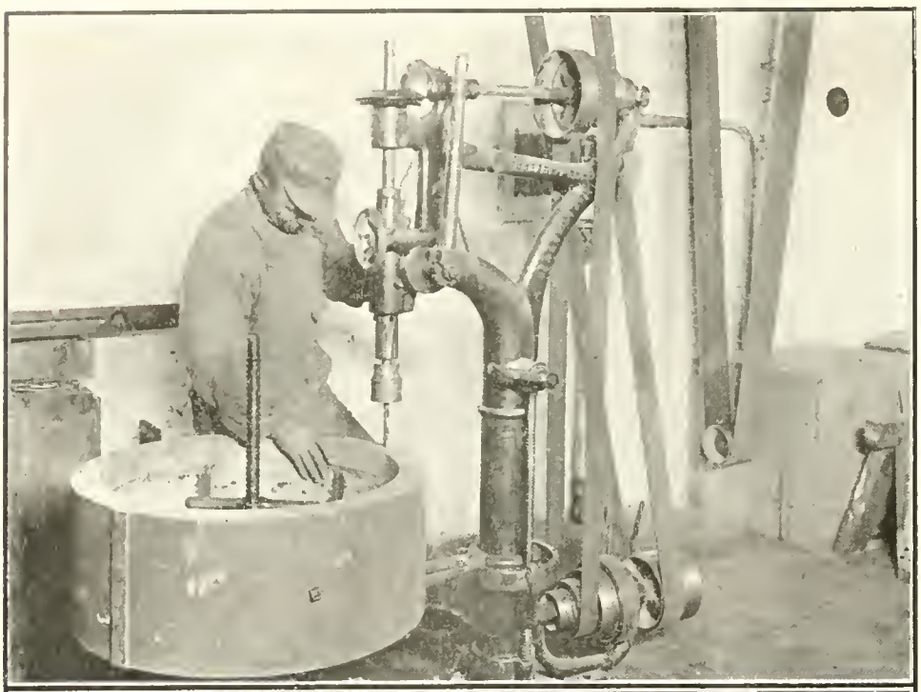
Extra Box

By cutting out a square in the floor of the tonneau and attaching a proper-sized box underneath, you can have a very convenient carrying receptable in space that is not otherwise taken up. It makes a good place to put a carbon foot-warmer in winter, and may be used for tools and jack at other times.



Blacksmith drilling holes in wood felloe of 6 in. dual wheel. The automatic carriage connected with drill insures perfect results.

View showing front portion of wheel shop on second floor service building, equipped with every modern appliance to facilitate the completion of wheel, rim or tire work of all kinds.

View showing a portion of our Steel S A E Band Stock. This stock, as well as all necessary parts for our Removable Rim is always complete.

Photos by Spaulding.

The Firestone Service Station

The word service, as applied to the automobile trade of San Francisco, is at times a misnomer. There are, however, some companies whose service is all that the word implies. This is the case with the service station of the Firestone Tire and Rubber Company. The Firestone Service Station is the most completely equipped tire service station west of Chicago. It occupies the entire building at 1464 Bush street, which is just around the corner from the offices and sales department, but under the same roof.

Pacific Coast Manager W. H. Bell, in speaking of the service station says: "We have complete in one building the most modern machinery of every kind for making wood spokes and felloes, also for applying steel bands and rims for every size and description, damage wheels and

The San Francisco Service Station at 1464 Bush street.

spokes and worn out tires mean little delay to the Firestone customers.

"There is no waiting for wheel parts or tires; our stock is complete at all times and our facilities and equipments are ample to perform real Firestone service to every truck owner in San Francisco and surrounding territories.

"This big plant, the only one of its kind on the Pacific Coast, is maintained not only for the matter of profit, but to serve the company's customers.

"When one buys Firestone tires and rims, the deal is only half completed; the other half is the service we render by keeping their truck in continuous operation.

"Idle time is lost money; a loss of

money a loss in business. Tires to the motor truck losers largely determines the extent of this loss. Tires must meet the constant abuse of all roads, rough pavements, high speed and careless driving.

"No other part of the truck is so directly affected by this severe usage as the tires. It naturally follows that in time a new tire will be necessary, or an accidental injury to wheels or tires will require immediate repair.

"Now the question arises what facilities are at hand for getting the truck on the road with a minimum loss of time. The answer to this question is to be had in a visit to our service station. The different departments show how thoroughly we meet all emergencies, thus guaranteeing quick repair, which means dollars and cents to our customers.

"This unit service station is maintained for our customers' accommodation. No matter how large or how small the truck may be, we have the part in stock. A customer can get what he wants when he wants it.

"Our Firestone equipment on a truck insures the owner against irritating delays and secures for him the thorough-going co-operation of a complete and efficient local service station, which is the best that money can buy and brains invent."

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Big Increase In Auto Exports

According to the latest government reports up to September, 1913, there has been a tremendous increase in the last two years in the number of automobiles exported by the United States.

The reports are for nine month ending September in each case. In 1911 there were exported, both pleasure and commercial cars, 11,244 vehicles, valued at $11,565,034. In 1912 the commercial cars were recorded separately from the pleasure cars at $4,187,064, or a total of 18,405 cars valued at $18,252,299.

This year, for the nine months ending September the exportation of trucks jumped from 175 to 778, valued at $1,351,140, or an increase of one year in the value of trucks exported of 258 per cent. This shows conclusively that our commercial car makers now recognize the foreign demand for American trucks and have begun to supply it.

The pleasure cars exported in the nine months of this year are 20,175 in number, valued at $19,950,718, and all cars exported for this year total 20,953, valued at $21,301,858.

Comparing this with the value given for 1911 of $11,565,034, we find that automobile exports have practically doubled in the last two years.

View showing [illegible] and storing [illegible] before application to [illegible] wheels.

View of Tire Heater and Tools. With this [illegible] are made red hot and then applied to [illegible] hand [illegible] taking [illegible]

View of the first floor of Firestone Service Building. Entrance [illegible] entrance [illegible] street [illegible] and size stock. Here [illegible] very [illegible] and original "Firestone Service" feature on the Coast. This is an exclusive

View showing a portion [illegible] Stock. All sizes [illegible] This is a very important feature [illegible] "Firestone Service."

Hard Mud Plugs in Oregon

Exciting Trip Over Mountain Passes From Portland to Grant's Pass

Probably one of the greatest automobile feats ever performed in the State of Oregon at this season of the year was recently accomplished by W. S. Dulmage, accompanied by E. N. Brandt, of Detroit.

Brandt, when he arrived in Portland and informed Dulmage that he would like to make a trip across the State, through the mud, Dulmage remarked: "You have no conception of what our Oregon roads are at this season of the year, or you would not ask an impossibility of the car."

Brandt's answer was that he did not believe there were any roads that would be impossible, so Dulmage was inclined to call his bluff, and without any further ceremony the pair set out the next day at noon on a tour of the State.

This is Dulmage's description of the tour: "The first portion of the trip to Eugene was made without any stops. Upon leaving Eugene the crowd that surrounded the car informed us that there had not been a machine through for some time, and that it was an utter impossibility for us to secure traction on account of the deep mud that we would encounter in Pass Creek and Cow Creek Canyons.

"When leaving Cottage Grove we were also apprised of the fact that several teams were in waiting in the canyons and at nearby farms, and that the drivers of said teams were making automobiles their prey to the tune of $25 per haul. Most of this bad road was encountered after dark, the chuck holes being so deep that the drivers were obliged to hang on to the car in order to keep from being thrown into the ditch. In a great many places it seemed as though the whole car would become submerged, but owing to its light weight, combined with its extreme power, it negotiated the hills beautifully, and pulled us out of the mud time and again. In fact, the motor never missed a shot, neither did the water require replenishing on the heavy grinds that we were compelled to take on the extremely long hills going through the canyon. About 2:30 o'clock in the afternoon, when we were within eight miles of Oakland, we overtook an automobile that had buried itself in the mud, and the occupants were trying to keep warm by a bon-fire, with the expectation ot remaining there all night, or until help could be procured.

"Well, of course, we offered our own services as well as the services of the car, and hooked on the cripple, hauling it and its occupants up Rice Hill, which, by the way, is some hill, and Oakland was finally reached at about 2:30 a. m. This was really one of the most spectacular performances ever made by a car in that territory; in fact, every one seemed surprised to know that an automobile had come through, as we were informed that those who had tried it a few days previously had been compelled to call for help, and were hauled through by horses.

"A great many of the residents of Oakland advised up that we had better not attempt to go any farther, as it would be impossible for us to get through Cow Creek Canyon, and that some grades were as steep as 42 per cent, and also that the road was very heavy going. But after our previous experience in the mud, our appetites were only whetted for more hills to conquer, so on we went.

"We reached the famous Cow Creek Canyon about dark, and as we had brought mud hooks, we decided that it might be wise to keep them where they could easily be reached in case of necessity. Up to this time we had used nothing but chains on all wheels. Our car seemed working better as it limbered up, the motor having a beautiful purr, and the powerful electric lights threw their luminous rays a great distance ahead. We found ourselves sending our way up the canyon through exceedingly dense timber in this mountainous country, but we really enjoyed the six-mile climb, and after reaching the summit, we found that we were only 12 miles from Glendale, which is located in a beautiful spot in the hills.

"After having dinner in Glendale, the people we met there informed us that it was useless for us to presume to go on to Grant's Pass. Having made the trip so far in such a successful manner, we both felt as though there was nothing impossible in the way of mountain grades or mud, so concluded that we would try the ascent of Wolf Creek, a distance of about five miles of very heavy mountain grade, with some very dangerous curves. Luck was with us in keeping the road, as at many places we were compelled to hug the mountain sides very closely in order to keep from going into the canyon. After passing Wolf Creek, our danger was over. Upon arriving at Grant's Pass, we concluded that we would proceed to Medford that night.

"When we returned to Medford, the heavy rains set in, and we were forced to make the return trip over the same roads, only under much more disagreeable circumstances. There were times when we encountered hard going, and we did not see how it would be possible for any heavy car to proceed over the same road without sinking out of sight. Most of the return trip through the canyons was made after dark, in a heavy downpour of rain, which made it exceedingly difficult, notwithstanding the fact that our electric lights were everything that could be desired. Our greatest difficulty lay in keeping the windshield clear of mud in order to see the road. All of the automobile dealers we met en route seemed wonderfully pleased with the performance of the car."

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A Tire Pump

The common impulse tire pump may be attached permanently to a priming cup opening by means of a short curved tube having a cut-off in it. The pump should be fastened to some stationary part not too near the exhaust manifold. This way of attaching the pump obviates the necessity of handling it while hot, and renders the removal of the spark plug unnecessary, but the ignition cable to that cylinder must be detached when the pump is used. When is is very convenient to pump up tires, they will be much more apt to be kept full of air.

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"S" Wrenches

If the handle of a wrench is too long for the capacity of the jaws, there will be danger of stripping threads. For this reason, the mechanic's "S" wrench is the safest wrench to use. These wrenches are scientifically proportioned for the work required of them.

Where are the Racing Cars of Yesterday?

Record Breakers that are Now Numbered Among the "Has Beens" or Have Reached the Scrap Heap

Where are the racing cars of yesterday? If a staid, sober old age hasn't engulfed them, most probably they have ended their last lap a twisted heap of steel and wood.

From the idol of a wildly cheering, speed mad crowd to respectable daily labor; a serene domestic life, or a mildly exciting private career, is but a step in the racing game, and one by one these speed demons of the days gone by have slipped behind the portals of the yesterdays, have slowed down and allowed the newer and more powerful cars to pass them.

What has become of Casey Jones, Black Bess, the Peerless Green Dragon, the Cyclone, Whistling Billy, Reo Bird, Ford 999, and a score of other fast travelers?

To the "four winds" for many; daily grind for some; for others a more or less speedy career under private tutelage; oblivion for the balance.

With a flaming gasoline torch throwing smoky shadows on a score of upturned faces, Casey Jones, the trim gray Locomobile, winner of the twenty-four hour race at Ascot Park, began its downward career as demonstrating car for an advertising dentist.

Night after night poor old Casey drew up to the curb with a defiant snort, and soon a crowd of curious people gathered about. Not drawn because of the gray car that had won a well-fought race in the past, but attracted there by the gaudy red plush dentist's chair; the metallic bark of the advertiser; the licking flames of the torch. In some small hamlet in Southern California to-night, when dusk purples the shadows, you will find old Casey Jones still pursuing its new career at the will of the painless one.

Like ashes scattered to the wild winds, nothing tangible remains of Reo Bird, the little racer that, at one time, held all the middleweight records. It was broken up and its parts put back into stock years ago. Because of the two Reo engines which the Bird sported, this car was widely discussed. It was raced in all parts of the East by Bruno Siebel and Charles Bigelow.

"Whistling Billy," the notorious White Steamer that Bert Dingley drove in 1906, is to-day, as Dingley says, "just scrap."

Billy the Whistler was some high stepper, if all the stories of his past are to be believed. After turning over with Webb Jay a couple of times, Dingley broke it up a few times more to sort of settle it, but it refused to become "bridle wise." After being put in first-class shape at the factory, Whistling Billy made a beautiful ascension with Gus Siefried, at Ascot Park. Just why, nobody knows, but Billy struck his nose into the track, and made three beautiful somersaults, and there wasn't enough left of the Whistler to rebuild.

In Barney Oldfield's past there have been many unusual racers (autos, of course) associated, for Barney has hit some high places in his time, but his little Ford 999 had perhaps the most interesting finish of any of his string.

Named by Earl Kiser, the driver whose leg was torn off by Oldfield's Winton Bullet six years ago, the little yellow car met its first real accident when the 999 and a car known as the Red Devil, were both wrecked in Milwaukee in 1903, Driver Frank Day being killed outright. Soon after, Ford 999, which was the first racer Oldfield ever drove, and the first car to make a mile in less than a minute on a dirt track, was rebuilt and sold to Bill Pickens, Oldfield's manager, who shipped it to Los Angeles. Because of the condition of the car, Pickens refused to accept it, and it was held by the Southern Pacific for some time, and at last sold for the freight and storage charges to Dana Burks, former Mayor of Ocean Park. Burks tried to race it at the opening of the Motordrome, but Ford 999 had run its last successful race; there wasn't a go left in it.

Oldfield's Green Dragon was one of the racers to land right. The Peerless Green Dragon was the only one of his cars that he says he hated to sell.

It was back in 1905 that Barney sold the emerald-hued car that every automobile fan in the country knew, to George Clark, of New York City. The following year Oldfield, on a visit to the little old town, saw his Green Dragon, serenely purring in front of one of the fashionable shops in Fifth avenue.

A second seat had been added, and the exhausts had been covered, but to Barney it was the same old car. As he gazed at his old sweetheart, feeling as though he would like to get in and drive away, a good-looking female person waltzed out of the shop and hustled to the car. Dressed in green from slippers to hat, she was something of a Peerless green fairy herself. Barney says the last impression he had of his car was a pair of snappy black eyes and yards and yards of green veiling floating out behind the auto as the green racer with its old-time falsetto bark beat it up Fifth avenue.

There was a dark-haired girl mixed up with one of Tetzlaff's ex-racers also—that is, there was one he is willing to tell of. The Fiat he drove in the 1911 Phoenix race as far as the San Diego telegraph pole, into which he smashed early in the game, was rebuilt and used later as a demonstrating car. The pretty daughter of a Kansas farmer fell in love with the car (as Teddy demonstrated it), so the big Fiat was shipped back where they grow corn and good-looking girls. Home life for this racer.

The Toledo steamer, which Charles Soules piloted to victory in the first 100-miles endurance race ever held over what is now the Vanderbilt course, caught fire and was completely destroyed at Birmingham, Ala., in 1902.

Soules said he averaged fifteen miles an hour in that 100-mile race, and everybody was delighted with the speed. After such a record, it would seem as if no place would be too warm for the Toledo steamer.

Eddie Maier sort of makes a specialty of driving ex-racing cars, and in his stable is Big Ben, Oldfield's mighty Stearns, as well as a number of other machines.

Frank A. Garbutt, vice-president of the Los Angeles Athletic Club, numbers the Nazzaro car in his auto stable. This is one of the few ex-racing cars whose life has fallen into pleasant lines. The big red Fiat looks as strong and bright as

the day it led the Grand Prix, and was acclaimed the fastest 90 Fiat ever made.

Garbutt is justly proud of the Nazzaro Fiat, every part of whose engine was selected by the clever Italian driver, each bearing the initial "N." Wherever Garbutt goes, the splendid workmanship on the engine awakens admiration.

Garbutt's old racing car, known as the Stewart-Garbutt car, which Garbutt built, and with which he broke the amateur record for a mile, was sold and never afterwards heard from. It dropped from the knowledge of the man who made it as completely as if it had taken wings.

This has been the case with ever so many of the ex-racing cars. As soon as their speed days are over, they are rebuilt or taken apart, and form integral parts of a host of other racers.

Bert Dingley's Pope-Toledo racer, known as El Valiente, was sold to ex-Mayor Hazzard, who attempted to duplicate the spectacular flights of the Reo Bird by installing two engines in the car. The Pope-Toledo, however, refused to do double duty.

Tetzlaff's white Lozier that turned the fastest lap in the first Santa Monica road race, was rebuilt, as was his 90 Fiat. This latter car was driven in the Corona race by George Hill.

The Lozier car, with which Tetzlaff broke the world's stock car record and the American road race record at Santa Monica in 1909, was sold to Charles Twitchell, the inventor of the Twitchell air gauge, Tetzlaff getting $500 more than the car originally cost him.

Dingley's Pope-Toledo No. 2 is now the property of Carl F. Fischer, president of the Indianapolis Speedway. A quiet family life is to be hoped for this old car.

The Marmon Wasp, that long, tapering skyrocket on wheels, which Ray Harroun piloted to victory in the first 500-mile speedway race ever run, is now in the proud possession of Howard Marmon, head of the automobile corporation of which his name is a part. In the wonderful machine, Harroun covered the five-century at a rate of speed better than seventy-four miles an hour.

Old No. 8, the blue-bonneted National which little Joe Dawson drove into first place in the second 500 mile sprint with an average of better than seventy-eight miles an hour, is an object of much interest in the National factory at Indianapolis. Last May it was given a few sprints around the track, and the famous old boat proved that it was far from flirting with the scrap heap.

It was respectable service for the 1911 Cadillac that captured the American twenty-four hour record of sixty-three and one-third miles an hour. Since retiring from speed stunts, the Cadillac, as a service car for Don Lee, has covered 75,000 miles, and as Don Lee says: "She still has speed."

Speed! The thing that made the fame of these cars, and which counts more with their drivers than faithful service.

Speed gone or on the wane, and one by one these racing cars are dropped from the roll of honor, and even their names pass from the memory of man.

The Blue Streak, the Yellow Peril, the Black Death, the Gray Wolf, and all others—may Mercury, the god of speed, justly reward their efforts.

Mrs. J. B. Mitchell, wife of Manager of Borland Electric Car Co., distributors for Southern California, in her Borland Roadster.

Mayfield Street to be Paved

In this season of glad tidings and good cheer comes an announcement that makes the motorist stop and wonder if really the age of miracles has passed.

Quietly, without the blare of trumpets, the ringing of bells, or the firing of canons, it has been announced that the main street of Mayfield, the connecting link in the highway down the peninsula, is at last really going to be paved.

One has to pinch himself on hearing this announcement to make sure that it is not a dream.

The amount of money expended on printer's ink and other incidentals necessary to publish the articles of scorn that have been written concerning this road in the last ten years would almost have paid for its construction. The town with the name that brings thoughts of the aristocratic section of London has evidently awakened from its Rip Van Winkle slumber. It is to be hoped that it is a real awakening, and that it will not turn over and go to sleep again, for it has been impossible for those using the El Camino Real to pass this town by. They had to go through it in a Dante's passage to the other side.

There is supposed to be an end to everything, and it is hoped that kind fate has at last put an end to the bad roads of Mayfield.

Yet the News Letter fearing that this report may not be true, quotes from a late issue of the Daily Palo Alto Times the following:

"At the regular meeting of the Mayfield town board of trustees, recently, a contract was signed to pave Main street under the plans prepared by F. A. Nikirk, city engineer. The construction company was placed under $2,000 bonds to complete the work within 120 days.

"The action of the board will result in the closing of a gap of about one mile of bad roadway through Mayfield. The proposed work has been under discussion for two and a half years, and has been strongly urged by residents of Mayfield and Palo Alto and by motorists who use the peninsula road from San Francisco to San Jose.

"The new roadway will be built the width of the street from gutter to gutter for about one-half mile, and the remainder of the distance it will be twelve feet wide on either side of the Peninsula electric right of way, later broadening out to twenty-four feet. This is considerably wider than the State highway."

It is "Big Bill" Hanrahan who has the contract, and woe unto Bill if the job is not done quicker and better than man has ever known.

How enterprising dealers are enjoying year 'round profits

MR. Gasoline Car Dealer, why let the stack of dollars you have already earned, dwindle—simply to keep up your organization—waiting for the "season?" Think what other dealers are doing; how their business is kept booming; and profits kept coming in month after month! THEY have taken time by the forelock—THEY are selling electrics—and are enjoying splendid, steady incomes. Now, right now, YOU have the chance to do EVEN BETTER; for, dealer territory for the BORLAND ELECTRIC is open—the BORLAND ELECTRIC, the most extensively advertised electric on the market today.

"The car with the clean-cut thoroughbred air"

The Borland Electric

5-passenger coupe; 7-passenger limousine; open body, wheel steer roadster

Why not strike now while the iron is hot? Mold the prospects, our national advertising is creating, into prospects for you. Think how gratifying it will be to your own bank account to get outside assistance like the sales of BORLAND ELECTRICS will give. Cash-in on this opportunity NOW. The BORLAND ELECTRIC is the car with ALL the BEST features; backed by financial strength many a bank would envy; thoroughly, sturdily built and graceful of line and design. The car that's easy to sell and certain to satisfy.

SPECIFICATIONS AND EQUIPMENT

Extra roomy five-passenger, coupe body; wheel base 96 inches; left side drive with horizontal lever control from either front or rear seat; six speeds forward and three reverse. Automatic cut-out disconnects power when emergency brake is applied. Regular equipment includes "EXIDE" batteries; standard makes of cushion or special pneumatic electric tires; Klaxet Horn; "Hull" silk umbrella; non-skid chains; etc.

Dealer Territory Still Open

Sales rights for the BORLAND ELECTRIC in the states of California, Nevada, Arizona, Oregon, Washington, and Idaho, also in British Columbia are under the direction of Henry L. Hornberger. Dealers will find it profitable to call and see the BORLAND ELECTRIC car; or, write or wire the address below for particulars of liberal dealers' proposition.

Henry L. Hornberger

Pacific Coast Station

1909 Pacific Avenue

SAN FRANCISCO, CALIFORNIA

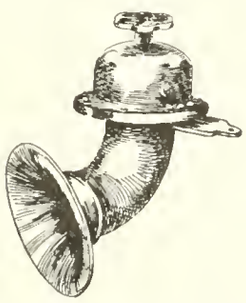
Of Interest to Motorists

Gathered Thoughts of Man Who Has Been There Before

Information concerning any of the articles described in this department may be had by applying at the News Letter office

NEW PILOT HORN.

The Pilot horn is mechanically operated, dispensing with batteries, wires, etc., and there is no other expense involved than its first cost. It is operated by a small, conveniently located handwheel, a slight turn of which causes a low and pleasing tone. The sound may be increased to a loud blast by increasing the speed of rotation, and the maker



states that this construction permits a wide range of sound as desired. It is furnished with brackets for attaching to either the right or left hand side of the car, and is also made with a straight projector and a fore door bracket. The finishes are all black, black and brass, black and nickel. A design for the steering column is constructed, a special bracket being made.

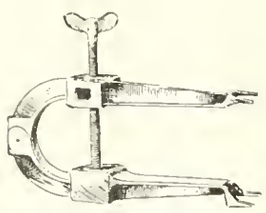
POLARITY INDICATOR.

In charging storage batteries, and in wiring some circuits, it is essential that polarity be observed, and this is not always easily determined, as the identification marks may be obliterated. The Manhattan polarity indicator which, when connected in the circuit, will instantly detect the negative and positive

poles. It is very compact, being 3.5 by .75 inch, and a nickel plated shell encloses and protects the glass tube from injury when carried in the pocket or in the tool box. It is made for battery service, also for service with current ranging from 50 to 600 volts.

NEW VALVE LIFTER.

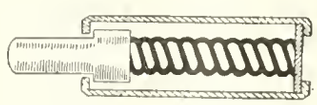
A new valve lifter, which is a U-shaped member with integral tapered points, has just been put on the market. It may be utilized in the conventional manner or to compress the springs by



placing the points between the coils. It is operated by a wing-headed screw bolt having sufficient leverage to compress the spring with a minimum of effort, and one of the features of the device is that both hands may be used in displacing the locking position. The maker states that it will fit all types of motors. It is moderately priced.

ANTI-RATTLE.

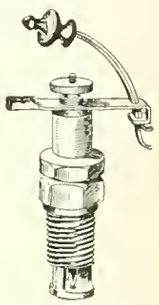
The Perfect Anti-Rattle, which is designed to be placed between the door and jamb of a motor car body and to eliminate existing rattles due to warping or faulty fitting of the door, is the latest. The device comprises a barrel member in which is a spiral spring. The design



also includes a bumper or plunger. The barrel is constructed of brass, and fits tightly into the hole bored in the door jamb. When the door is closed the spring pushes the bumper against the door, holding it firmly and eliminating, it is said, all rattling.

SPARK PLUG TESTER.

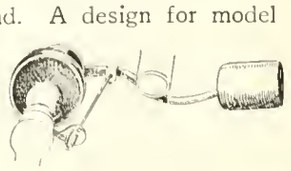
The usual method of locating a missing cylinder is to short circuit the second wire at the spark plug with magneto ignition or to hold down a vibrator with the coil and battery system. When using a screw driver for testing, one is likely to receive a shock unless care be exercised. The Dalitz spark plug tester and terminal is a simple device for attachment to



the plug. It comprises a flat strip of metal, having at one end a terminal for the reception of the secondary wire, and an opening at the other in which is inserted a movable arm of metal. This arm is equipped with a non-conducting handle, preventing any possibility of shocks when using the device. To cut out the ignition to a cylinder, the movable arm is slid downward until its end comes in contact with the base or shell of the plug. This effectually grounds or short circuits the current, preventing it from reaching the air gap. The device may be utilized for a number of other purposes, including that of testing the strength of the secondary current. This is performed by moving the arm in proximity to the base of the plug and noting the intensity of the spark. The tester may also be employed to note the compression of each cylinder when in operation, by the strength of the explosion. Another use for the device is locking the ignition. This is obtained by grounding each arm when the car is left unattended.

NEW TIRE PUMP.

Power tire pumps on the motor car are a valuable addition to the equipment, saving as they do the work of pumping by hand. A design for model T Ford



cars, which is driven from the extension of the crankshaft of the motor, and is attached by drilling a single hole, has just

been placed on the market. A special fan pulley is furnished to replace the old member, and it is claimed that the power pump may be installed easily. The pump cylinder is cast iron, and the piston rings are carefully fitted. All bearings are brass. The pump is operated by a rod extending to the front of the radiator. The company claims it is the first pump to be driven from the engine shaft. It is moderately priced.

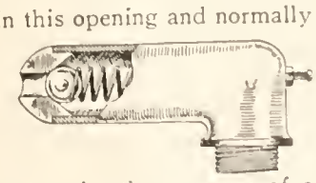
NEW CURRENT INDICATOR.

A new current indicating device is termed the C. O. D., from its three indications, "Charge," "Off" and "Discharge." It is designed for service with electric lighting and motor starting systems, and to indicate whether the battery is being charged, discharged or the

generator is inoperative. The device is located on the dashboard, and has rectangular dial opening through which in the condition shown appears the word "Off." When current flows from the generator through the indicator to the cells of the battery, the word "Charge" immediately appears, no matter how slight the rate of current. When the battery is called upon to supply electricity to the lamps, for example, the word "Discharge" appears. It is claimed that no springs, cams, levers, or mechanical multiplying means are employed, there being but one moving part. The circuit through the instrument is of heavy copper strap of a cross section greater than that utilized for the ordinary wiring circuit, so that losses are negligible, and there is no possibility of a burn-out.

NEW GAS SAVER.

A device which is stated will save 25 per cent of the fuel and increase the efficiency of the motor is the Automatic Gasoline Saver. It is utilized with the carburetion system, and comprises a hollow circular metal member having an air inlet at the bottom. A metal ball seats in this opening and normally closes



the aperture by the pressure of a spiral spring. The movement of the ball from its seat is regulated by the spring and by the suction of the piston of the motor. Means are provided for suitably tensioning the spring to regulate the amount of air admitted. The principle involved is that of atomizing any particles of fuel not properly vaporized by the carburetor, thus permitting less fuel to be used.

ADJUSTABLE WHEEL PULLER.

The Ridlon adjustable gear and wheel puller comprises a 12-inch screw with a .75 inch standard thread upon which travels a 1.5 inch conical block. On each of the opposite sides of this block are a

pair of pulling arms, retained in position by a shoulder screw. Each arm member has nine openings, through which the shoulder screw may be placed, providing nine different adjustments. The pulling arms have a hook end placed at an angle of 135 degrees to the long section of the arm, so that when the long part is at 45 degrees to the screw, the hook end will be parallel with it. This position allows the hook to bear against the gear with its entire face, insuring a firm grip.

EMERGENCY SPRING REPAIRER.

It is decidedly inconvenient to be caught on the road some distance from home with a broken spring. While temporary repairs may be effected with blocks, etc., considerable care must be exercised in the operation of the car. A practical device called the Kantalever emergency spring repairer, which, when applied properly, is stated to be able to sustain a broken spring for an indefinite

period. The Kantalever may be utilized for any type of brake, including that of the main leaf near the spring horn, as the device is provided with an opening through which a bolt may be inserted, practically providing a new horn. The repairer can be applied to any broken section as suitable clamping bolts, etc., accompany the device. The Kantalever is made of 50 point carbon steel, and is guaranteed not to break under the strain of any car load.

NEW TALKING HORN.

A signaling device which presents interesting features, in that it may be utilized as a signaling horn or to produce sounds closely resembling the human voice, is the Talking Horn. It resembles in appearance the conventional types of signaling members, but is manually operated, a small handle being fitted.

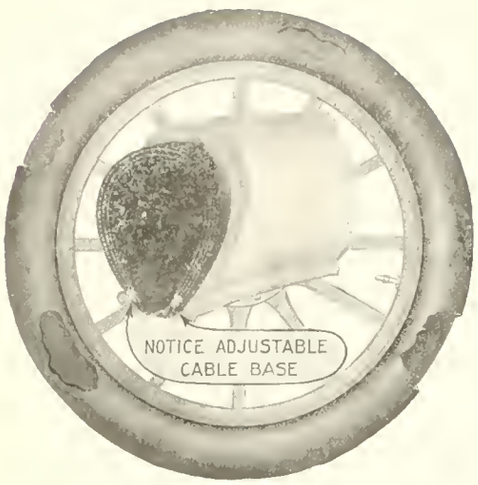
When this is moved to certain positions, then rotated to the left, it is stated that it will talk, producing one of three phrases, "Hello Mamma," "O Mamma," and "Mamma." The maker of the device claims that the resulting effect is pleasing to the pedestrians, and that sound can be heard for a considerable distance. By rotating the handle anticlockwise, a plain sound is produced. The positions for the different phrases are lettered on a dial under the handle, and it is stated that with a little practice one can manipulate the handle without reference to the marks. The device comes finished in brass or nickel to match the car. The company also produces the O. B. horn, similarly operated, but without the talking feature, and one adapted to the motorcycle.

LEAK PROOF PISTON RINGS.

One of the latest accessories and necessities to reach the local market is the Leak Proof Piston Rings, manufactured by McQuay-Norris Manufacturing Company. Leak Proof Piston Rings justify their name because of their construction and performance, which eliminates leakage—two concentric sections, one fitting within the other, the opening in each section being absolutely closed by the flange on the opposite section. The result is the only practicable piston ring

made which is continuous and power tight.

They are in use to-day in over 150,000 automobiles along in the United States. There are hundreds in use in stationary and marine gas engines, steam engines, street cars, pumps, air and ammonia compressors. Leak Proof Piston Rings are not an accident, nor an experiment. They are built only after years of experimenting.



NEW INNER SHOE.

One of the latest accessories to be placed on the market, and at the same time one of the most useful, is the Samson and Peerless inner shoe. It is endless in shape and strength, being guaranteed to double the mileage of tire equipment and pleasure. This new product is handled by Jackson-Eno Rubber Company.

WATCH HIGH TENSION CABLE.

In some cars, the two longest high tension cables running to the spark plugs sometimes hang close to, or even touch, the hot metal of the cylinders. After a time, the insulation becomes inefficient, and when the jar of the car brings the cable in certain positions, there will be a short circuit or no spark. It is usually only when the car is in motion that these misses occur, and they are thus difficult to locate. The remedy for this trouble consists in suspending the cables to the radiator rod, so that they will not get close to the cylinders.

TO REPLACE WINDOWS.

When you are called upon to replace the celluloid window in your back curtain, do it in this way. After cutting the celluloid to proper size and shape, fasten it temporarily in place by pushing pins through at each corner. Then button the curtain taut, and with a second person on the inside to pass the needle through outwardly, sew it in place, using the original needle holes as far as possible.

TO MIX GAS.

The factors of maximum fuel economy in a gasoline engine are complete gasification of the liquid fuel, a correct proportion of air with the fuel, and a hot spark. The first of these is favored by warming the air that goes in to make the mixture. A fine meshed wire cloth clamped in the joint of the carburetor and intake manifold will favor fine subdivision of the spray from the feed nozzle, and is of some advantage. Protecting the intake manifold from the cooling effect of the fan will also help to make a good mixture.

TO ADJUST FOOT BRAKE.

To adjust foot brake, push the pedal forward about two inches and retain it in place with a small block of wood. Now tighten up the turn-buckle until the brakes are snug, and when the block of wood is removed, the slack will be correct.

PAINT ON AUTOS.

Paint on an automobile is not exclusively for appearance. The protection afforded to wood by paint renders it permanent in its strength and usefulness for a much longer time than could otherwise be expected. Its principal function is to exclude moisture, which quickly rots the wood. Automobile wheels should be kept well painted.

FUEL TANK.

A fuel tank of two compartments, one for gasoline and one for kerosene, with a two-way cock in the feed tube that may be easily operated from the seat, will make it possible to burn kerosene part of the time. If the carburetor is hot-jacketed, and the engine first made hot by the use of gasoline, kerosene may be used quite successfully.

TO FILL A GREASE GUN.

To fill the grease gun properly, remove the nozzle end, and with the piston clear in, push the piston down with the grease as you feed it in with a flat paddle of wood. If the piston works hard, pull it down about one inch, fill the space with grease, and then pull the piston down another inch and fill again. Repeat until it is full. The suction of the piston will draw the grease down so that the vacant space can be easily filled.

——Nine miles from town, the dry cells exhausted, so that they would not start the engine, said an automobilist. I borrowed the telephone cells of a nearby house, started the engine, and returned the cells while the engine was running idle.

——A short piece of rubber garden hose makes a good protector for spark plugs.

——Acetone varnish will restore the transparency of celluloid windows.

Queer Requests for Auto Numbers.

A number of applicants to Secretary of State Olcott, of Oregon, for registration of motor vehicles make peculiar requests. One application requested a particular number running in the hundreds, stating it was easy for the applicant to remember and represented the cost a month for operating his first car, the number of miles traveled the first year, and the number of punctures and blow-outs experienced.

Another request was for the number used by "Old Doc Yaak" on his car. Still another applicant said that his car, while presumably operated for pleasure, was mostly a nuisance.

The following letter was received by the Secretary of State a few days ago:

"I got about one day's use out of my old rattletrap of a runabout—yes, it will run about a mile and stop or break some of the gearing.

"So I thought last summer it was to high to pay $3 for one day's ride in my old car so I walked the rest of the season and it isn't fixed up yet or I haven't got the repairs from the factory yet I did not have the courage or the money to get it fixed up, yet some times I have a noshin not to fix her up for it is just an old bill of expence maby if you would come down I might give the old rattletrap to you and get read of it—and or maby if I can fix her up a little and run her careful and maby I can trade it off for a yeler dog or a cat."

——The proper time to examine and adjust push rods is when the engine is hot. They should have just enough clearance to allow the valve to seat firmly when it is hot. If adjusted when cold the heat expansion may keep the valve from seating securely.

——"Stockings" for dry cells, made of sections of old inner tubes, protect them from short-circuiting influences.

——Denatured alcohol, squirted into the cylinders when they are hot, and the engine run fairly fast for two minutes, will clean out the carbon.

WHO GETS THE ORDER?

Some mean man in Seattle has started a riot movement of the automobile dealers of that city. The trouble is all over the decision of the city council of Portland, which has appropriated $5,500 for the purpose of purchasing an automobile to be used in escorting distinguished visitors about the city. Every dealer is trying to land the order.

Believes in the National Highway

The idea of national highways, built and maintained entirely by the government, has no stauncher advocate than Judge J. M. Lowe, of Kansas City, Mo. Judge Lowe, who is vice-president of the National Highways Association, and president of the National Old Rails Road Association, the national old trails road department of the National Highway Association, does not believe that good results can be effected by what is known as "Federal aid" or "National aid;" least of all, by that form of aid which proposes that the government appropriations should be spent, not on main roads, but on roads radiating from railroad stations.

In a letter to Governor Major, of Missouri, Judge Lowe says: "If $50,000,000 were appropriated annually, it would average about one million to each State if distributed equally.

"If Missouri should get $1,000,000 and should distribute it equally to every county throughout the State, she could build about four-fifths of a mile of hard-surfaced road in each county.

"But there are those in Congress (I do not think they are to be found elsewhere) who seem to have a vague notion that the thing to do is to make the railroad depot the hub, and radiate from that point to reach the farmer's produce; but let's see how that would work:

"In a great many counties there are several lines of railroad. Who will decide which line to prefer? If all lines are to be treated equally, what would the result be?

"Take Missouri for example. She has an average of, say, ten depots in each county. If each county can build only four-fifths of a mile out of each $50,000,000, appropriations were kept up.

"At that rate, it would take twelve and one-half years to get one mile of road out from each depot.

"The average haul in Missouri is nine miles, so it would take 12 years to build one road out from each depot to meet the requirements of an average haul, and to 'radiate' in only four directions would take 448 years if an appropriation of $50,000,000 were made annually.

"What is the reasonable thing to do? And how are we to get roads? If $50,000,000 is appropriated annually for only six years, and applied to a system of National highways, it will build 30,000 miles at an average cost of $10,000 per mile. I believe that this is a reasonable estimate for a first-class road.

"This system could be made to furnish an average of two trunk lines, across each State and across the continent, and all connected with the national capital."

Umatilla County's Tax Levy For Good Roads

Umatilla County's tax levy for road purposes is $2\frac{1}{2}$ mills. As the assessed valuation of the property subject to the county road tax is about $40,000,000, this will provide a fund of $100,000. No road districts in this country have made special tax levies.

In speaking of the purposes and plans of the court in expending this money, County Judge Maloney said: "It is the policy of the court to avoid a bond issue if possible. We are, therefore, building permanent roads just as fast as we can get to them. During the past two years we have built about 10 miles of macadam road each year at an average cost of $5,000 a mile, and we expect to build at least 10 miles this year.

"By the end of the month we will have spent $118,000 for roads and bridges in the country during 1913. There has not been a wooden bridge built in the county since I have been a member of the court, and there will not be one built with my consent so long as I am a member. We believe there is economy in permanent bridges.

"We constructed 14 steel bridges during 1913. Most of these were small. We have our own engineer, do our own cement work, and are as well equipped as any contracting firm in the country. By having our own equipment we are able to cut the cost of constructing concrete piers and abutments nearly in half. As an illustration, the court recently asked for a bid on a piece of concrete work. The bid was $22 a cubic yard, whereas we have been doing the same class of work for approximately $6.50 a cubic yard.

"Approximately half of our road fund is consumed each year in the repair of dirt roads. This work has to be done over each year, but there is no way to avoid the difficulty until permanent roads are constructed.

"The first ambition of the court is to complete the Pendleton State Line Highway. This will extend from Pendleton through the towns of Adams, Athena, Weston, Milton and Freewater, to the State line. In addition to the towns named, it will pass through a number of wheat shipping stations, thereby proving a great benefit to the farmers. At present, but $15\frac{1}{2}$ miles of the 40 have been built. The road now built is in three sections. The first section extends from Pendleton to Havana station, a distance of eight miles. This section is being extended daily. The second section is the three and a half miles connecting the towns of Athena and Weston, while the third section extends from the State line southward for a distance of four miles. We are making the road 14 feet wide, and are constructing it of water-bound macadam."

A. A. A. Elects Officers

John A. Wilson, of the Pennsylvania Motor Federation, has been elected president of the American Automobile Association, succeeding Laurens Enos of New York, who declined a second term. Dr. H. M. Rowe, of the Automobile Club of Maryland, was advanced to the first vice-presidency; R. W. Smith, of Colorado, was named as second vice-president; F. L. Baker, of California, third vice-president; H. J. Clark, of Minnesota, fourth vice-president; and Preston Belvin, of Virginia, fifth vice-president. John N. Brooks, of Connecticut, continues as secretary; H. A. Bonnell, of New Jersey, as treasurer; and A. G. Batchelder as chairman of the executive board. In the appointment of board chairmen, President Wilson named the following: Good roads, George C. Diehl, New York; legislative, C. C. Janes, Ohio; touring, Howard Longstreth, Pennsylvania; contests, Wm. Schimpf, New York. The executive board contains members from practically every State.

Great Tales Liars

The Supreme Court of Wisconsin has decided that if a man rides in a motor car on the invitation of another, he takes the risk for whatever may happen during the ride. The decision was made recently and reverses the decision of the circuit court in the suit of M. J. Hannon, of Green Bay, against the Van Dycke Co., of Green Bay, for $2,500 damages and costs as compensation for two broken legs and other personal injuries. The Van Dycke Co. hired a touring car to take Hannon into the country to inspect a farm, which it was offering for sale, and on the journey homeward the party met with an accident, in which Hannon was thrown from the car and badly injured.

No Auto Tax If Machine Has No Wheels

There will be a clear saving of $1,000,000 to $1,500,000 to automobile owners and a loss of the same sum to the State, if the fight against the new auto tax is successful. At the office of Attorney-General Webb it is said that the elimination of the tax provision of the new auto law will remove all possibility of a tax on motor driven vehicles for the time being, as the law contained no saving clause.

AMATA *A Novel By*

LOUISE E. TABER

Author of "The Flame"

Will begin in the January number of OVERLAND MONTHLY. The scene of this intensely interesting story is laid in San Mateo, a fashionable country residence section, some twenty miles south of San Francisco. Those readers acquainted with Miss Taber's work will know that this new serial grips the attention.

With the New Year, OVERLAND MONTHLY will offer a number of attractive features designed to appeal specially to that large group of readers who are interested in the WEST and the trend of the dynamic forces now completely transforming it through commercial, financial and social processes. Events and the LIFE pertaining to the GREAT WEST, and that new theatre of WORLD WIDE INTEREST, the Eastern countries bordering the Pacific, and the Island Groups therein, will be the SPECIAL FIELD covered by OVERLAND MONTHLY. Whenever obtainable, COPIOUS ILLUSTRATIONS will be furnished. If you are interested in this line of reading blazed by Bret Harte, the first editor of OVERLAND MONTHLY, subscribe for it. *$1.50 per year.*

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From Out of the Northwest

Interesting Reports From One of Nature'e Grandest Touring Ground in North America

Seattle Auto Show Will Be A Big Event

Success is assured the second annual Seattle automobile show, which is to be held in the National Guard Armory on February 9th to 14th inclusive. Manager William I. Fitzgerald has received applications for every foot of space in the huge structure, and when the doors are thrown open to the public there will be assembled under a single roof the most representative display of automobils in the history of the Northwest. The sucessful show of last year, and the big exhibition a few weeks later in Portland willbe eclipsed by a wide margin. A record breaking attendance is predicted.

Atleast seventy-five automobiles will be exhibited in the armory in addition to several displays of motorcycles, tires and automobile accessories. Upwards of fifty makes will be represented on the floor. Manager Fitzgerald is bending his efforts toward getting as many different makes of machines in the show as possible, and it will give the persons attending an opportunity to compare all the leading products of the industry under one roof.

To Bee Brier, manager of the Mitchel Lewis & Staver Company, goes the distinction of being the first to sign a contract for space in the second annual show. The Mitchell factory is anxious to participate, and has arranged to have a splendid exhibit at the Seattle affair. Tom White, manager of the J. W. Leavitt Company, is decided upon his exhibits of Overland and he predicts even greater benefits than were derived from last year's show.

The Metz Company's northwest branch will display its sturdy little gearless transmission cars, and also the Glidden trophy, which was captured by a team of three Metz cars in the run from Minneapolis to Glacier National Park. Possession of the trophy carries with it premier honors in touring events of the year, and the cup is bound to draw many visitors to the show and the Metz exhibit.

The Northwest Buick Company, distributors of the Buick and National cars, has decided to go to the show. Manager Eldridge promises an exhibit that will create no small end of conversation.

Manager Robert Atkinson, of the Pacific Car Company, is anxiously awaiting the coming of the show, for he has something interesting to display in the form of the sensational new Hudson light six. He also will show a Paige-Detroit model, which car is attracting much attention in Seattle.

Manager W. A. Wicks, of the Franklin-Wicks Company, was a participant in last year's show, and he is so well pleased with the results obtained from that event that he will exhibit at the February show. The new Franklin light six model will serve to draw visitors to the Franklin booth. The Wicks company recently took over the agency for the Stewart truck, and that machine will be included.

The Seattle Automobile Company will show its Maxwell "25," the machine that has become known in motoring circles as the "biggest automobile in the world," and also a model of the Stearns, the agency for which the firm recently acquired.

The Gerlinger Motor Car Company will create some splash in the show with its Oldsmobile pleasure cars and the Federal, Menomimee and Standard trucks. The Parker Motor Car Company will make its first appearance in the automobile field, with its Pullman machines. They will be here in ample time for the show, and should attract considerable attention.

The Waterhouse Trading Company will exhibit the latest models of the Studebaker pleasure cars and the Lippard-

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Pacific Coast Distributors

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Stewart and Garford trucks. The Washington Carburetor Company will have an interesting display of Cartercars; F. H. Bardshar will exhibit his latest models of Stevens-Duryea, Cole and King cars; the Metropolitan Motor Car Company will show its new Kissel pleasure models and trucks, while the Abbott Motor Car Company will bid for popularity with its pretty new Oakland and Marmon cars.

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Olympic Highway

Within the next two or three years there will be opened to traffic a splendid highway encircling the Olympic-Peninsula-Washington opening to automobilists and nature lovers a vast field of scenic wonders.

Clallam County and the State Highway Commission are taking advantage of every day of good weather to push construction work now under way to completion.

The crews are far apart, but they are striving toward one end, namely: the laying down of a good road from Olympia, and encircling the peninsula, passing through Shelton, Hoodsport, Duckabush, Brinnon, Quilcene, Port Angeles, Beaver, Forks, Bogachiel, Humptulips, Hoquiam, Aberdeen, Montesano, Elma and McCleary.

For the eastern part of the Olympic highway between Hoodsport, in Mason County, and the Duckabush River, the Legislature appropriated $111,814, and an additional sum of $9,220 for maintenance. Active work already is proceeding on the eastern portion of the route. Honro Camp No. 1, containing thirty convicts under charge of Frank Randolph, has been operating a little more than two months on heavy rock work out of Hoodsport.

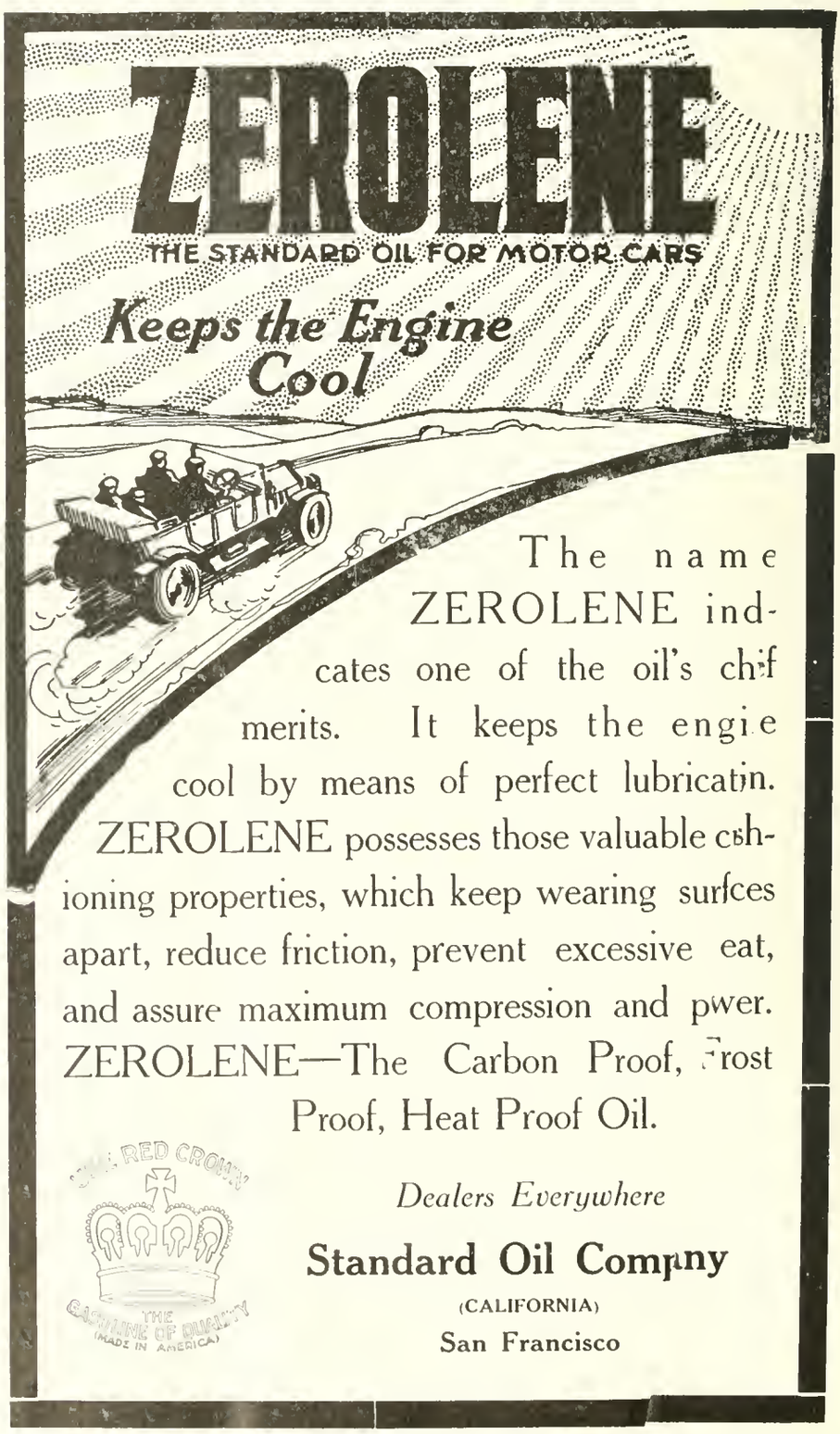
It has been decided to allot to the convicts as much work as it is estimated they can do by October 1, 1914. This, it is expected, will take them through Hoodsport to a mile or two north of Lilliwaup, a total distance of about seven miles. Progress is slow, because the highway is blasted out of solid rock.

About a month ago, contract for nine miles of the northern part of the eastern wing of the highway was let, and some work will be done this winter. As soon as the work that the convicts in the honor camp can do by next fall is more definitely estimated, contract for the middle portion of the east side division, that between the northern end of the convicts' work and the southern end of the nine mile stretch, will be awarded. The highway commission has just approved plans for the portion of the route between Sunds Landing and Hama Hama.

Clallam County is making rapid progress with its road programs, for which $300,000 was voted some time ago. Twelve miles of the Olympic Highway near Sequim has just been completed, and sixty miles more will be constructed, all to be finished within two years. The twelve mile stretch winds about the shores of Discovery and Sequim Bays, crosses the rich valleys of Sequim and Dungeness, and then leads up into the Olympics to Lake Crescent, that gem-set body of crystal pure water in the heart of the snow-capped range.

For the western wing of the Olympic highway from Hoquiam north, the State set aside $44,727. It has practically been decided to establish a double route between Hoquiam and Humptullips by cooperation between the State and Chehalic County. The understanding is that the State is to improve the road as located on the State Highway Commission's map, while the county is to construct a new and shorter road direct between the two points. The new route is known as the Hanson road.

Construction of the Olympic Highway means much to the peninsula counties, as it will give them a passable route to the Puget Sound country; also it will open a vastly rich scenic touring ground for the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The name ZEROLENE indicates one of the oil's chief merits. It keeps the engine cool by means of perfect lubrication. ZEROLENE possesses those valuable cushioning properties, which keep wearing surfces apart, reduce friction, prevent excessive eat, and assure maximum compression and power. ZEROLENE—The Carbon Proof, Frost Proof, Heat Proof Oil.
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(CALIFORNIA)
San Francisco

motoring devotee. The peninsula abounds in rare views of verdant fields, torrential glacial streams, towering firs and rugged mountain peaks. Its fame is little known now, but with the opening of good roads that section of the State is destined to draw hundreds of touring parties each year.

Automobiles have been driven from Seattle to Lake Crescent by way of Tacoma, Olympia and Shelton, but the journey's pleasures are somewhat minimized by the rough condition of the highway in places and by steep grades. Those who have made the trip, however, are loud in their praises of the grandeur of the country, and hail with great delight the progress that is being made by the State Highway Commissioner's office and the crew of Clallam County.

A number of automobile owners have shipped their machines by boat to Port Townsend, and toured from that city to Port Angeles, and thence to Lake Crescent. Out of Port Angeles the highway is in fairly good shape for about six miles, and then comes a long stretch of roadway of boulevard smoothness.

It passes through fertile valleys and giant forests to the mighty valleys and giant forests to the mighty Elwha River. After crossing the raging stream, the highway ascends the slopes of the Olympics to Lake Crescent. From this point the road continues in a westerly direction to Beaver, and thence south through Jefferson and Chehalic Counties to Olympia —the State capital.

When the routes now under construction are completed, automobilists will not have to depend upon boat service, but will be able to motor from Seattle to the mountain fastness over splendid thoroughfares.

The new routes are expected to be of inestimable value in developing the extensive resources of the peninsula counties, which are now practically without vehicular communiaction with the country on the eastern shores of Puget Sound. The peninsula contains vast areas of timber land and thousands of acres that are admirably suited to agricultural and dairying purposes.

Over the Siskiyou Mountains

The contract for the construction of the Siskiyou Mountain section of the Pacific Highway has been awarded. The work included in the contract, which was awarded, will be grading of the road between the California line and Medford, a distance of 13 miles, and it will also be macadamized.

The work included in the Central Point project will be the paving of three miles of road; bids for this work were rejected. The following is the engineer's estimate for quantities on the Siskiyou road: 134,428 cubic yards of earth excavation; 21,804 cubic yards loose rock, 43,412 cubic yards solid rock; 13,913 square rods clearing and grubbing; 4,036 lineal feet 12-inch corrugated iron pipe; 40 lineal feet 180 inch corrugated iron pipe; 576 lineal feet 24-inch corrugated iron pipe; 593 cubic yards concrete, class A; 89 cubic yards concrete, class C; 70,000 pounds reinforced steel

Baker County Roads

Baker County has many good roads, but it needs and wants more. Roughly estimated, there has been spent much more than $1,000,000 on roads in the county within the last fifteen years, and while some of this has gone for repairs, the bulk of it was for pushing the nose of better transportation into country that before was isolated at least part of the year.

There are 3,000 miles of roads in the county, and most of them are in good condition, either naturally or through the work of man. The same figures will apply, only to a much lesser extent, in Harney and Grant Counties, adjoining Baker County.

The two bordering counties are as anx-

Safety when you need it — low cost mileage all the time

GOODRICH
SAFETY TREAD TIRES

The tread that makes the brake effective

Your car brakes cannot stop a skid—we have *put brakes in the Goodrich Safety Treads* for you.

The Safety Tread Bars stop the skid before it starts. They push away the ooze, they clean and dry the path and *grip* it. No ooze, no skid.

This non-skid feature is just *one* of the advantages in Goodrich Safety Tread Tires. Starting, steering, turning, stopping, speeding or idling, Goodrich Safety Treads mean *control* and confidence. And they give you extra mileage, with more Goodrich thick, tough-tread rubber on road surface.

Best in the Long Run — Best in the Short Stop

The B. F. Goodrich Company

Everything That's Best in Rubber

Branches and Service Stations in All Principal Cities—Dealers everywhere

Factories: Akron, Ohio

There is nothing in Goodrich Advertising that isn't in Goodrich Goods

ious to develop their roads, but they are less thickly settled, and therefore have not the funds, nor the use, for the roads, that Baker County has.

Waterspouts played havoc with some roads in all three counties this spring, but especially so in Harney and Grant Counties, one automobile party from here having many narrow escapes from bad road accidents last June in going through Harney and Grant Counties.

Naturally, this repair work has taken away from the active campaign for building good roads, for out of the road fund several bridges had to be built. Baker County is preparing for the future by installing steel bridges wherever feasible.

Six were built this year at a cost of about $25,000, while of the other $30,000 spent here, much of it went for repairs. Consequently, the County Commissioners have little funds for additional road building this year, according to County Judge Peter Basche.

One road that lies in Grant County, but which Baker County opened, was in the Granite District, because the business all came to Baker, and therefore Grant County did not wish to improve, because, it argued, that the road was of less benefit to the people across the line than to Baker County.

While the waterspouts did their damage in the extreme western part of the county, they did little harm to those in the remainder, and Baker County roads are always praised by automobilists when traveling through here. They speak especially high of the road between here and La Grande, saying it is one of the best in this part of the country.

This has made Baker City interested in the highway along the Columbia River from Portland to The Dalles, because the people believe that it will open a way for automobilists to come into this country, which can now not be done unless cars are transported from Portland to The Dalles. And Baker County is always interested in any plan to bring people here, because it is anxious to let people see what is here.

Another reason that Baker County wants good roads is because it wants better transportation. The railroads are slow to enter certain parts, especially into the fruitful Eagle and Pine Valleys, and the people feel that until that time the auto truck can care for the needs. If auto truck service can be established, it will save hours and dollars in hauling freight and passengers between Baker, the county seat, and the parts 100 miles away.

The county has connected Pine and Eagle Valleys with a road, 14 miles long, and at a cost of $15,000 through the mountains. It is the Sag Road, famous for its steep grades and good condition in all parts of the year, and is used by six-horse freight teams and every kind of vehicle up to the automobile, but at the expiration of four years it is in as good condition as at first. This is because the road was dug out of solid rock and needed no dressing.

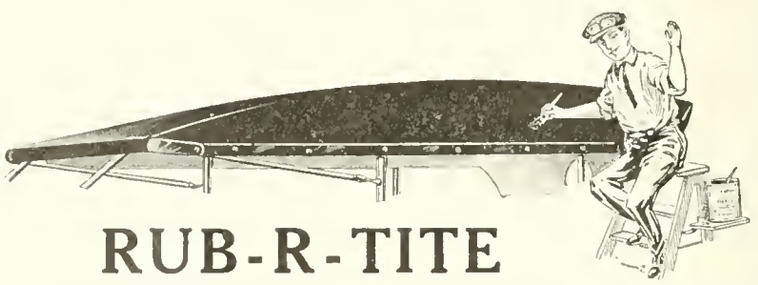
Most of the roads are of gravel or crushed stone, and the road supervisors have a friendly rivalry in making their own the best, so that they may be kept in good condition.

In all parts of the country there are many good roads. They are required not only for the farmers, but the mines, which are in all parts, and the mining industry is recognized as worthy of fostering. Many of the mines have built roads of their own, which has helped the general condition. The Ben Harrison mine is 20 miles from a railroad, and therefore made a good road, and is installing an auto truck of the caterpillar type for freighting. The Gem mine is putting in a five-ton truck to run between Baker and Sparta, a distance of 40 miles. The lumber companies have built into their camps many serviceable roads, all of which join with the general road system.

The good roads problem's importance is fully realized here, and the people are always asking for more. It has been generally talked of as having good roads days, similar to those in Missouri and Arizona. This city, people have been es-

"This top looked shabby and leaked like a sieve—$50 was the price of a new one, but my neighbor told me how, a year ago, he made his top clean and waterproof as new—for ONLY a $5 bill. Now you see

I'M SAVING $45



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RENEWS AND REWATERPROOFS

any worn and leaky top Leather or Imitation Leather.

RUB-R-TITE is a scientific laboratory product. Neither sun, storm or folding will cause it to peel, crack, blister or rot. If occasionally used (reduced) it prolongs the life and wearing qualities of any top indefinitely.

It is applied with a brush, easily and quickly. It dries quickly. It is economical—$1.50 to $5 renews a top (cost depends on size and kind of material.)

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THE UNIVERSAL CAR

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Standard Models

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Model—	Price
Touring Cars	$360
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San Francisco

Prices F. O. B. Factory

Models			Prices
122	4 Cylinder, 2 Passenger	30 H. P.	$ 1550
612	6 Cylinder, 2 Passenger	60 H. P.	2750
611	6 Cylinder, 4 Passenger	60 H. P.	2750
616	6 Cylinder, 6 Passenger	60 H. P.	2950

pecially in favor of the plan because they say that it will not only make better roads, but it will give them an opportunity to show the farmers that they are willing to join, and thus are interested in the development of the county as well as the city.

Another road that Baker is anxious to see developed is that from Prairie City, in Grant County, to Long Creek. They now have to go over 30 miles to Heppner, but if the road is built, they can be within 14 miles of the railroad at Prairie City, and thus easily reach Baker.

Shock Absorbers

The correct principle for a shock absorber is resistance to the upward motion of the spring, but no resistance to the downward motion. This may be accomplished by attaching a broad and strong strap to the frame of the car, have it pass underneath the axle and forward to a stiff coiled spring as nearly horizontal as possible. When the weight depresses the springs the coiled spring draws up the strap, and when the body of the car rises the friction of the strap around the axle retards the action.

To Change Gears

When an amateur driver shifts his gear the excess of sound makes an expert smile. To shift gears noiselessly, release the clutch to its fullest extent, then push the change gear lever with a quick, jabby motion until the gears go in. Do not slowly push the lever into position. This causes the teeth of the gear wheels to strike and be thrown back, and each approach repeats the noise. The expert endeavors to secure co-ordinate speed of the gears before trying to throw them into mesh.

Save Repairs Save Money Save Trouble

by replacing worn out Bearings with the world renowned HESS-BRIGHTS. All sizes carried in stock

Pacific Coast Distributors

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ATTENTION!!

THE "WESTERN CHALLENGE" PERSONAL ACCIDENT POLICY OF THE MIDLAND CASUALTY COMPANY IS JUST THE ONE YOU WANT.

—WHY?—

ASK ANY AUTOMOBILE OWNER. ASK HIM HOW QUICKLY WE PAID HIS CLAIM IN FULL WHEN HE WAS HURT OR ASK

EDWARD P. FISH & SON

GENERAL AGENTS

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FOURTH ST. GARAGE

FOURTH & HARRISON STS.

SAN FRANCISCO

Commercial Trucks A Specialty

Automobile Supplies

The attention of owners of pleasure cars living in San Mateo County is called to the convenience of this Garage to Third and Townsend Street Depot.

THE LARGEST GROUND FLOOR FIREPROOF GARAGE WEST OF CHICAGO

LARKINS & CO.

Carriage and Automobile Body Builders

Established in 1865

Announces the removal of their Offices and Factory to

1610-1612-1614 Van Ness Avenue

Between California and Sacramento Sts.

Phone Prospect 30

Where their entire attention will be devoted to the prompt delivery of the best work that a modern plant, high-class mechanics and materials can produce.

EMPIRE

Model 31

"The Little Aristocrat"

Completely Equipped $950

The Completely Equipped Empire five-passenger touring car $950 Equipment includes Mohair Top and Top Envelope, Demountable Rims, Rear Double Tire Irons, Extra Rims, Accelerator, Windshield, Prest-O-Lite tank, Horn and Speedometer.

The Empire Automobile Co. Indianapolis, U.S.A.

AUTOMOBILES AND TOURISTS' BAGGAGE

INSURED AGAINST

Fire, Theft and Transportation

While anywhere in United States, Canada and Europe

ÆTNA INSURANCE CO.

OF HARTFORD

PACIFIC BRANCH—325 California Street, San Francisco

Tips to Automobilists

(CUT THIS OUT.)

The News Letter recommends the following garages, hotels and supply houses. Tourists will do well to cut this list out and keep it as a guide:

SANTA CLARA COUNTY.

SAN JOSE.—Stop at LETCHER'S New Garage for first-class service. We cater to the touring public. Attractive parlors for ladies in connection. "Mission Front" garage next to corner of First and St. James Sts.

SAN JOSE.—Lamolle Grill, 36-38 North First street. The best French dinner in California, 75 cents, or a la carte. Automobile parties given particular attention.

PALO ALTO.—PALO ALTO GARAGE, 443 Emmerson St. Tel., P. A. 333. Auto livery at all hours. Tires and sundries in stock. Gasoline, oil, repairing, lathework, vulcanizing. Open day and night.

PETALUMA.—PETALUMA GARAGE AND MACHINE SHOP. Sparks & Murphy, Props. Cor. Third and C Sts; Phone Main 3. Automobiles, general machine work and gear cutting, supplies, repairing, auto livery, lubricating oil and gasoline, the care and charging of storage batteries.

PEART & ELKINGTON

Phone Market 6370

VULCANIZING

42 Van Ness Avenue

SAN FRANCISCO, CAL.

HOTEL VENDOME

SAN JOSE, CAL.

Headquarters for Automobilists touring the beautiful Santa Clara Valley.

American and European Plan. Reasonable Rates.

AUTO FENDER & RADIATOR WORKS

Make and Repair

Fenders, Radiators, Hoods, Metal Bodies, Tanks, Dash Shields, Lamps, Mud Pans, Tool Boxes, Metal Spinning, Etc.

466 Golden Gate Ave. Phone Franklin 6460

32-34 Van Ness Ave. Phone Market 6409

The New Chandler for 1914

We're marketing a new standard of automobile satisfaction in a way that leaves no room for doubt and gives each buyer an intelligent knowledge of wherein the Chandler, point-by-point, surpasses any other car for low first cost and low upkeep.

Rather than follow the ordinary way of enthusing over the beautiful appearance and refinements of the Chandler Light Weight Six, we hand you, at your request, a PROOF SHEET, with 60 questions on it, and the answers filled in for the Chandler. Spaces are left for fourteen other cars so that you or your dealer can fill in the corresponding answers for the other cars and then note by direct, unfailing comparison, how the Chandler represents a greater collection of advantages than embodied in any of the other cars.

And you won't have to carry these things in your head to forget them or be confused by them and you won't have to worry about the claims and counter claims of rival dealers or be misled by subtle knocks or imposed upon with glittering generalities. Make 'em prove it—that's all.

Send for the PROOF SHEET.

Either write or call at once—and, at the same time, let us demonstrate the Chandler and give you an exhilarating, enlightening experience with its impressive flexibility, easy riding, luxury and economy.

Less than a year ago, when we made the Chandler a sensation by basing automobile economy on the only scientific basis—weight—we knew that we would have imitators. Then the Chandler was alone in this regard—but others to-day are trying to follow. Only correct scales can be depended on for the correct weight of any car—verbal estimates miss the mark from 200 to 700 pounds. We guarantee the Chandler to be only 2,879 pounds, shipping weight, fully equipped.

One of the purposes of our PROOF SHEET is to help you to get this weight question right. Don't risk your car economy on guesses. It has 59 other important purposes because the Chandler has 60 distinct advantages, all of which cannot be found in any other one car. And these 60 advantages do not include incidentals like Thermos Bottles or Tire Inflators, but big, vital features, some of which can be duplicated only on the highest priced cars.

Can you see in your mind this handsome streamline Chandler, light weight obtained by using pressed steel and aluminum, with a motor which cannot be obtained in any other car, running

1360 Miles—at 17 1-6 miles a gasoline gallon—on 7 quarts of oil.

or being driven from Cleveland to Cedar Rapids, Iowa, on high gear only? These are only two of hundreds of sensational Chandler records made during the last year.

The Chandler, at 35 h. p., develops 3 to 55 miles per hour on high, and tames hills like valleys, turns in 37-foot radius, and pulls out of streams and hub-deep mudholes under its own electric power.

While you are waiting to see your Proof Sheet look carefully over these Chandler Specifications. If you have ever driven a car, they will tell you the Chandler must be considered seriously if you are in the market.

Not a Single Experimental, Untried, Doubtful Feature.

SPECIFICATIONS

LEFT SIDE drive—CENTER CONTROL.
WHEEL BASE—120 inches.
ROAD CLEARANCE—10 1-2 inches.
WHEELS artillery type—34x4 inches Firestone demountable rims.
MOTOR—Chandler Six Cylinders, 35 h. p. 3 3-8x5 inches. "L" Head type. Cylinders cast in two blocks. Valve enclosed.
OILING—Positive-gear pump in oil-base. Oil-gauge on motor-base.
IGNITION—Bosch High-Tension Magneto.
CARBURETOR—Stromberg "Little Six" Hot-air and dash priming attachments.
SELF-STARTER—Westinghouse Electric built into motor.
COOLING—Centrifugal pump. Mayo genuine Mercedes type Honey-comb Radiator.
ELECTRIC LIGHTING—Westinghouse Electric lighting Generator with large storage battery. Solar lamps, illuminated license-bracket.
CLUTCH—Multiple disc. Raybestos and steel ball-bearing.
TRANSMISSION—Three speeds forward and reverse. F & S imported ball bearing.
REAR AXLE—Floating type. F & S imported ball-bearing.
STEERING GEAR—Irreversible and adjustable.
GASOLINE SYSTEM—20 gallon tank in rear. Gasoline gauge.
STREAM LINE BODY—Five passenger coach type.
UPHOLSTERING—10-inch cushions. High-grade tufted leather. High grade springs.
WIND-SHIELD—Built in without rods or braces. Adjustable for rain vision or ventilation.
TOP—Mohair top with "Jiffy" curtain.
HORN—Genuine motor-driven electric.
JONES SPEEDOMETER.
CLOCK—8-day New Haven.
COLOR AND FINISH—Bodies, wheels, frame and running gear finished in handsome dark blue with silver stripe. Fenders, hood and cowl black. All hardware, lamps and fittings nickeled.

You can get equally light weight in other cars for less money, but you cannot get Chandler power, flexibility and quality. At a higher price it is impossible to get light weight and Chandler economy of upkeep. The Chandler is probably the lightest car of its size and power ever built, and yet as strong as a car can be made. The Chandler offers you the flexibility of a Six with the economy of the most economical Fours.

Built by Men Who Krow.

This organization has had nearly a decade of experience in the building of world-famous sixes. Seven years before the Chandler was produced these men were building Sixes, and when they produced the Chandler Light Weight Six it represented their most seasoned judgment, which has been borne out by the events of the year past in the automobile world. These men are—

F. C. CHANDLER, former Vice-President, General Manager and Director Lozier Motor Co.
C. E. EMISE, former Sales Manager and Director, Lozier Motor Co.
W. S. M. MEAD, former Foreign Sales Manager and Director, Lozier Motor Co.
S. REGAR, former Treasurer and Director, Lozier Motor Co.
J. V. WHITBECK, former Engineer, Lozier Motor Co.
C. A. CAREY, former Purchasing Agent, Lozier Motor Co., Assistant Purchasing Agent, Ford Motor Co.
J. R. HALL, former Manager supply, repair and service departments, Lozier Motor Co.

The Chandler will always be a year ahead of all the so-called Light Weight Sixes now appearing—they can never catch up. You do not want to pay for experimenting. Send for our PROOF SHEET now—or call—and find how not only first cost, $1785, but upkeep is lowest in the Chandler, especially when the whole 60 advantages are compared point by point with any other automobile.

Trouble Switch

There has been brought out a trouble light attachment which is designed for service with the standard model lighting switch, providing a means for attaching an inspection light without any additional wiring. The lamp is operated by a simple socket and plug connection.

AUTO OWNERS

Why take chances on your Ignition? Insist on using

RAJAH PLUGS

Do you know Rajah Plugs cost supply-houses three times as much as the cheap ordinary plugs?

Some reason for their boosting the plug which pays them the long profit.

Why are all these plugs similiar in appearance to the "Rajah?"

They all know that

"Rajah MEANS Quality"

Insist on the Genuine

Hughson & Merton, INC.

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AUTOMOBILE REPAIRING A SPECIALTY

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PHONES

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FORD SEAT COVERS

SEAT COVERS { TOURING $25.00 / ROADSTERS $17.50 } A SET

Equip your car with our Auto-fabric seat covers, trimmed with Ste·ling leather and give it the same nobby appearance as a high priced car. Our seat covers are absolutely waterproof and save the leather upholstery on a new car and cover up the worn parts on old cars, thereby adding to the appearance of your car and making it very easy to keep the upholstery neat and clean.

This is an opportunity to secure a high grade set of seat covers at a hitherto unheard ·of price and every Ford owner should take advantage of our offer at once. Our seat covers are all bound with Sterling leather, while the arms are trimmed in genuine Patent Leather the same as furnished on seat covers costing up to $75.00 a set.

TO FORD DEALERS

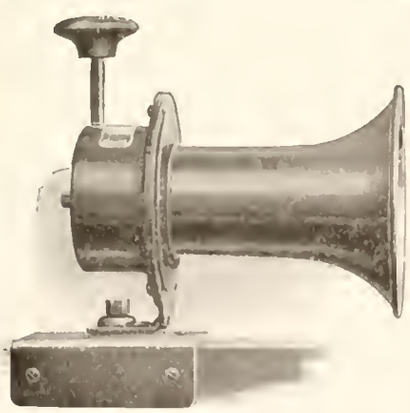
Who have not yet taken up our Ford seat cover proposition—read the above story—the description spells QUALITY all the way through, and it ought to convince you that you can sell Ford seat covers.

HUGHSON & MERTON, Inc.

DISTRIBUTORS

530 Golden Gate Avenue San Francisco, Cal.

THE LONG HORN



A powerful warning signal. All the effect of an electric horn but, NONE of the EXPENSE.

MECHANICALLY OPERATED

No batteries to keep charged; no wires or connections to break. It is there when you need it. TRY ONE. If not satisfied after 5 days use, return it and get your money back.

REGULAR TYPE—All Nickel, $20; Black and Nickel, $18; Black and Brass, $18.

JUNIOR TYPE—All Nickel, $12; Black and Nickel $11; Black and Brass, $11.

MOTORCYCLE TYPE—All Nickel, $10.

PACIFIC COAST AGENTS

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530 Golden Gate Ave. San Francisco

Mr. Motorist
Why Don't You Use

AJAX

TIRES ?

Isn't a *Reduction* in *Tire Expense* of 30%, worth considering? That is what our guarantee of 5,000 miles versus the usual 3,500, means.

Figure it out, take list price of a 34 x 4 tire $32 and divide that sum by 5,000, then 3,500, the two guarantees. Now figure on a basis of four tires and the mileage you average each month; isn't that saving worth considering?

HUGHSON & MERTON, Inc.

530 Golden Gate Ave. San Francisco

Oakland Distributors
PEART & ELKINGTON
12th & Telegraph

Repair Roads

Logan W. Page, chief of the office of public roads of the department of agriculture, is bending every energy to impress upon the people of the country that maintenance and effective repair are of equal importance with the actual improvement of bad roads. Investment of money in new roads does not become real economy until provision is made for keeping these new roads in condition after they are built. If a new road was built and then allowed to fall into disrepair, much of the original investment is simply wasted.

Quite frequently the office of public roads, when called upon for assistance by the various States points out that road building is an art based on a science, and that trained men and experienced men are necessary to secure the best results from the expenditure of road funds.

Statisticians have figured out that although the average expenditure on the improvement of roads exceeds $1,000,000 a day, a large portion of it is wasted because of the failure to build the right type of road to meet local requirements or the failure to provide for the continued maintenance of the improvement.

During the past six months the various States and counties have taken a greater interest in road improvement than ever before in the history of the United States, and there is now a strong movement to conserve the roads of the country when they are improved. The latest evidence of this interest is in the enthusiasm with which nearly 400,000 men and boys responded to the proclamation of the Governor of Mississippi, setting apart two days for work on the roads.

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Rajah vs. Rex

Some time ago the Rajah Auto Supply Company, of Bloomfield, New Jersey, brought action against the Rex Ignition Manufacturing Company of New York City for infringement. It was charged that the Rex Company had been selling porcelain parts with the knowledge that they were to be used in Rajah plugs. The court enjoined the Rex Company and recognized the Rajah's right to specify what porcelain should be used in Rajah plugs. The judge's opinion set aside the contention of the Rex Company that he did not know that the porcelain was to be used in Rajah plugs.

The Rex people contended that the license covering the sale of Rajah plugs is null and void, and therefore that it has an absolute right to sell Rex porcelain even with the knowledge that the purchasers intended to use them in Rajah plugs.

This was also denied, as the court ruled that although the Rajah Company might not control the price of its goods, yet at the same time could control the product after it had left their hands, inasmuch as parts could not be substituted and used or sold under the Rajah license.

Hence it is that an injunction was granted of a preliminary order with a good possibility of it being made permanent.

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Repair Cuts in Treads

Cuts in the tread of a tire should be repaired "instantly." The little gasoline vulcanizer that is now to be found in almost all tool kits can be used easily to get good results. Jack up the wheel, and while the gasoline is burning in the vulcanizer, clean out the cut thoroughly with gasoline, scraping it well with the blade of a pocket-knife, and filling with shreds of unvulcanized rubber tissue wet with cement. When the vulcanizer has become hot, place it on the ground underneath the wheel, and unjack the wheel so that the place to be vulcanized shall rest on the vulcanizer and the weight of the car furnish the pressure. In thirty minutes the wheel will be ready for use, but if left all night it will be a more permanent job.

SAFETY FROM SKIDDING AND PERFECT TRACTION

On any Roads are Offered Without Ultimate Expense in the Woodworth Treads

Woodworth Treads are without an equal as an anti-skid and traction device: they need to be put on only once to furnish you an equipment for thousands of miles of running: they are practically puncture-proof, and they protect the tires from all outside injury and wear, so that if used over good tires kept properly inflated, they prolong the life of the tires enough to pay more than their cost.

In other words, you get a perfect traction device, you get safety from skidding accidents and punctures not only without ultimate expense, but with an actual saving over the cost of bare tires.

But putting a set of Woodworth Treads on, you will be prepared for any roads you encounter. You will prevent the danger of having to repair punctures in bad weather and your tires will be practically as good when the treads are worn out as when they are put on, provided, of course, they are good and strong and properly inflated.

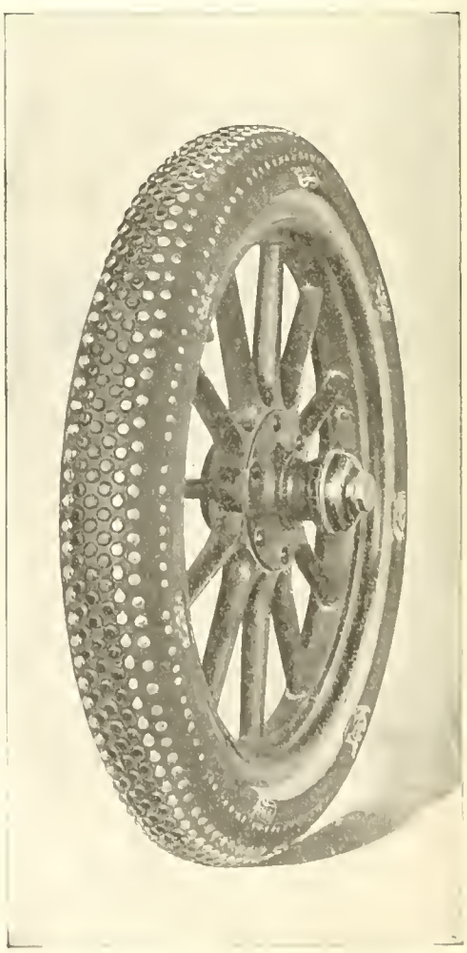
Woodworth Treads are sold by the CHANSLOR & LYON CO., at San Francisco and at all their branches.

Send for full information to the

LEATHER TIRE GOODS COMPANY

MANUFACTURERS

NIAGARA FALLS, NEW YORK



EQUIPMENT OF YOUR CAR

MEANS "EVERYTHING" when comfort and convenience are considered

TIRE HOLDERS serviceable and attractive.

HIND VIEW MIRRORS show the road and prevent accidents from rear end collisions

ROBE RAILS FOOT RESTS TIRE LOCKS

LICENSE PAD HOLDERS

All necessary for the Auto

E. H. WHITEHOUSE MFG. COMPANY

Newark, N. J.

A FULL STOCK AT

Chanslor & Lyon Co.

1238 Van Ness Avenue

San Francisco

The Lining That Forces Brakes To Make Good

TRADE MARK

Raybestos

REG. U.S. PAT. OFF.

"THE ORIGINAL AND BEST ASBESTOS BRAKE LINING"

It Makes Brakes Grip. It Insures Your Safety.

Will Not Wear Out—Can Not Burn Out. It Made The Automobile Safe.

RAYBESTOS is Made of Long Fibre Asbestos Specially Treated. It is Oil-Proof and Water-Proof. The Name is Stamped on Every Foot For Your Protection.

THE ROYAL EQUIPMENT CO.

Bridgeport, Conn.

CHANSLOR & LYON CO.

PACIFIC COAST DISTRIBUTORS

San Francisco Oakland Los Angeles Fresno Seattle Spokane Portland

HARRIS

TRADE MARK REG. U.S. PAT. OFF.

OILS

SAVE MONEY—because you require a smaller quantity than you do when using inferior lubricants.

ADD TO EFFICIENCY—because they are all lubrication. No waste, no injurious matter, nothing to harm the engine.

INCREASE POWER—because they give perfect lubrication. The engine runs smoothly. All frictional parts are coated with a film of lubricant.

Prove It. Try HARRIS OILS.

See for yourself the big improvement in your engine.

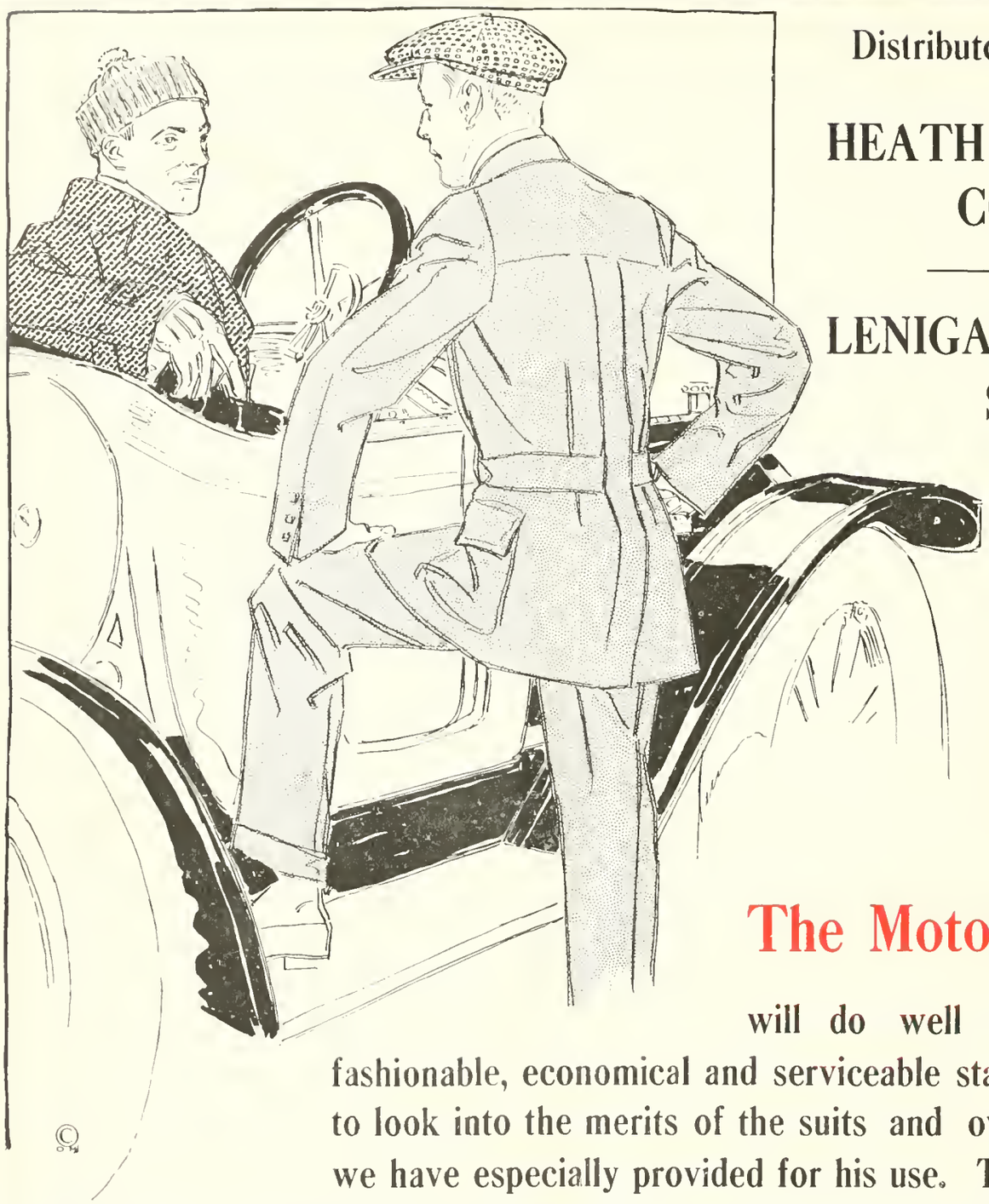
A. W. HARRIS OIL CO.

326 S. Water St., Providence, R. I. 143 No. Wabash Ave., Chicago, Ill.

CHANSLOR & LYON COMPANY

PACIFIC COAST AGENTS

Los Angeles San Francisco Oakland Seattle Spokane Fresno Portland



Distributors for

HEATH
COATS

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LENIGAN
SUITS

The Motorist

will do well from a fashionable, economical and serviceable standpoint to look into the merits of the suits and overcoats we have especially provided for his use. They are intelligently adapted to his requirements by makers who specialize on automobile clothing.

The chief essentials embodied in our automobile clothes are warmth, strength in construction, shape permanency and attractive stlye. Price moderation is of course characteristic in these clothes, as in all of our offerings.

Suits,
$20 to $50

The Hub
Chas. Keilus & Co. (Inc.)
726 MARKET STREET

Overcoats,
$20 to $75